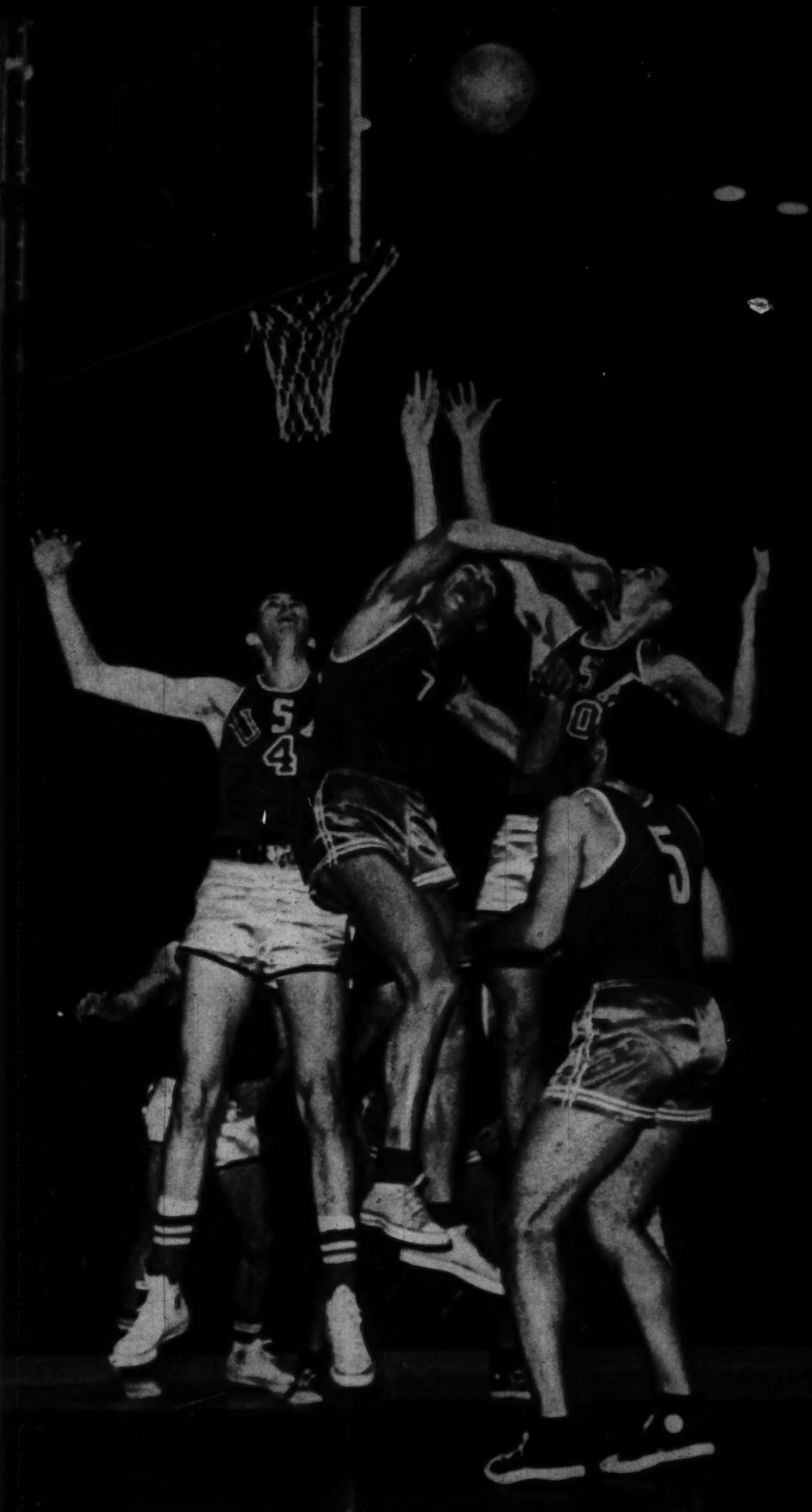


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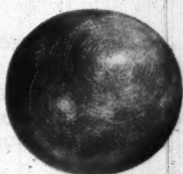
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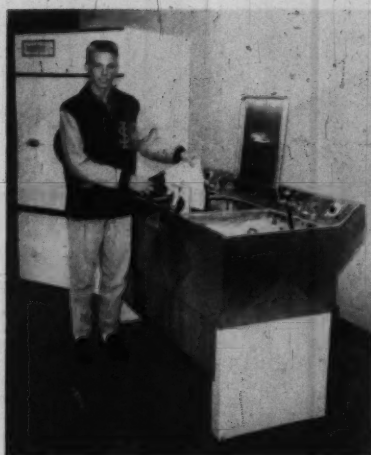
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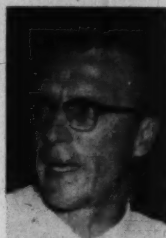
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VOLUME 29 • NUMBER 3 • NOVEMBER 1959

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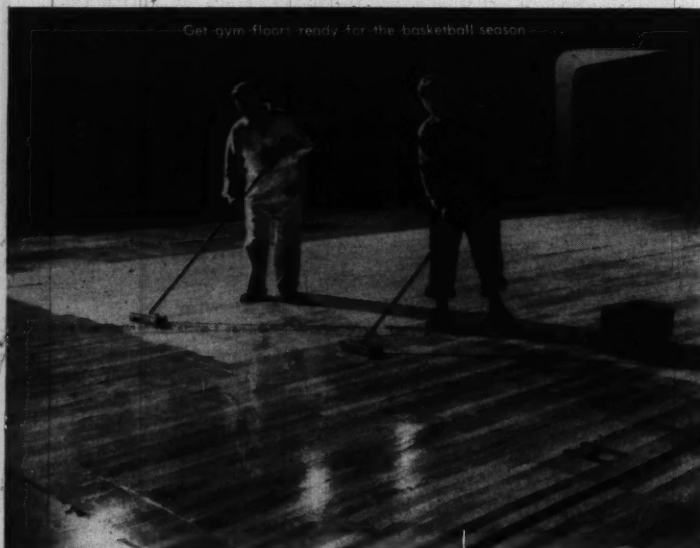
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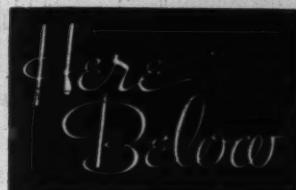
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Why boys really play football

WANT to get a composition printed in your local newspaper and 14 state bulletins? Then just whip up a piece on "Why Boys Play Football." Editors eat the stuff up.

We must have read at least a dozen such dissertations in recent years and they continue to dismay us. They insinuate that a *defense* of football is necessary.

Is the game *that* dangerous and harrowing? Our editors must think so, for you never find them publishing anything on why boys play basketball or baseball or shuffleboard. But football . . . a ha, *that* requires defending.

What's particularly irritating about these briefs—besides the fact they're unnecessary—is that they're so ridiculously pretentious. The authors, well-intentioned though they are, invariably oversell the product. In their fervid hands, football becomes a beneficence on par with godliness, love of country, and motherhood. The end result is absurdity.

Take one of the more recent disquisitions, for example. To the players, intones the author, football "is a field of hardship, sacrifice, discomfort and danger in a land of abundance and luxury."

Then why do the boys play it? Because "Football offers the age-old challenge to man's spirit. It is the challenge of danger and hardship . . . The same appeal that led Marco Polo to the Far East and sent the Spanish Conquistadores to the New World impels a boy to walk up to the coach and ask for a uniform."

"So as you look down on that gridiron this fall, you will see there the strong, the bold and the daring. You will see the spirit of Lancelot and stout Cortez. It is the spirit that has conquered, explored and built empires."

Honestly, now, isn't all of this just plain guff? Do the authors of such compositions really believe what they're saying, or are they saying what they believe coaches like to hear?

In all of the critiques we've seen on the subject, nary a one pinpoints the essence of football's great appeal. Sure, it's a fitness builder, a character builder, and a mold of men. Sure, it offers a challenge, demands sacrifice, and contains the element of danger.

But is that why boys play it? Of course *not*! They don't even *think* of such things. They play it primarily for—**FUN**.

Yes, football is a helluva lot of rough, tough, vigorous, exciting fun—a strenuous body-contact sport that appeals to kids with muscles, guts, and aggressiveness—that offers them a dramatic stage on which to release their natural combativeness and exuberance.

So let's cut out the hyperbole. Football requires no ethereal apologies. Let's give the kids the best in equipment, coaching, and supervision and let the character building take care of itself.

Marco Polo, Cortez, Lancelot . . . phooey. Viva Gino Marchetti!

COACHES are always paying valuable lip service to the importance of teaching kids to respect authority, but, alas, many of them rarely practice what they preach—if they preach it at all.

A close play at the plate, a critical ball or strike call, a bang-bang play at a base will catapult a coach from the dugout screaming like a banshee.

On the basketball floor, coaches will throw towels, bark like seals, or shriek at any official who dares call a foul on one of their clean-living American boys.

That's bad enough. What compounds the felony is that it incites the crowd and the players. Next thing you know the crowd is howling for the official's plasma and the kids are making like outraged Hamlets.

That's why our helmet is off to football players. Whereas in the comparatively tame games of baseball and basketball, the players will

scream at the slightest provocation, in the tremendously rough and tumble game of football they'll display a remarkably respectful and tolerant attitude toward officials.

Officials call back 65-yard touch-down runs, nullify vital first downs, keep pacing off 15-yard penalties at critical moments, yet the players—bruised, sweaty, maybe aching with frustration—take it all uncomplainingly! How many times do you see a player—high school, college, or pro—give an official any sort of argument?

To us, it's downright wonderful—and an object lesson to the temperamental darlings in other sports. (Who once defined temperamental as being 99% temper and 1% mental?)

ON the subject of respect for authority, we'd like to relay an incident that occurred in one of the the Harlem Globetrotters' exhibition games in Russia.

One of the Trotters' funnier bits involves a questionable call by an official. The player gives the ref an indignant look, then walks over to him and proffers the ball. The ref reaches for it—and the player flips it over his shoulder and catches it behind his back.

This never fails to draw a howl from the crowd—but it did in Russia! The Trotters were stunned when a cloud of silence greeted the stunt. After the game, a Russian official explained that such behavior toward officials is considered intolerable. Russian players are trained to pay the utmost respect to officials. Disrespect is never tolerated.

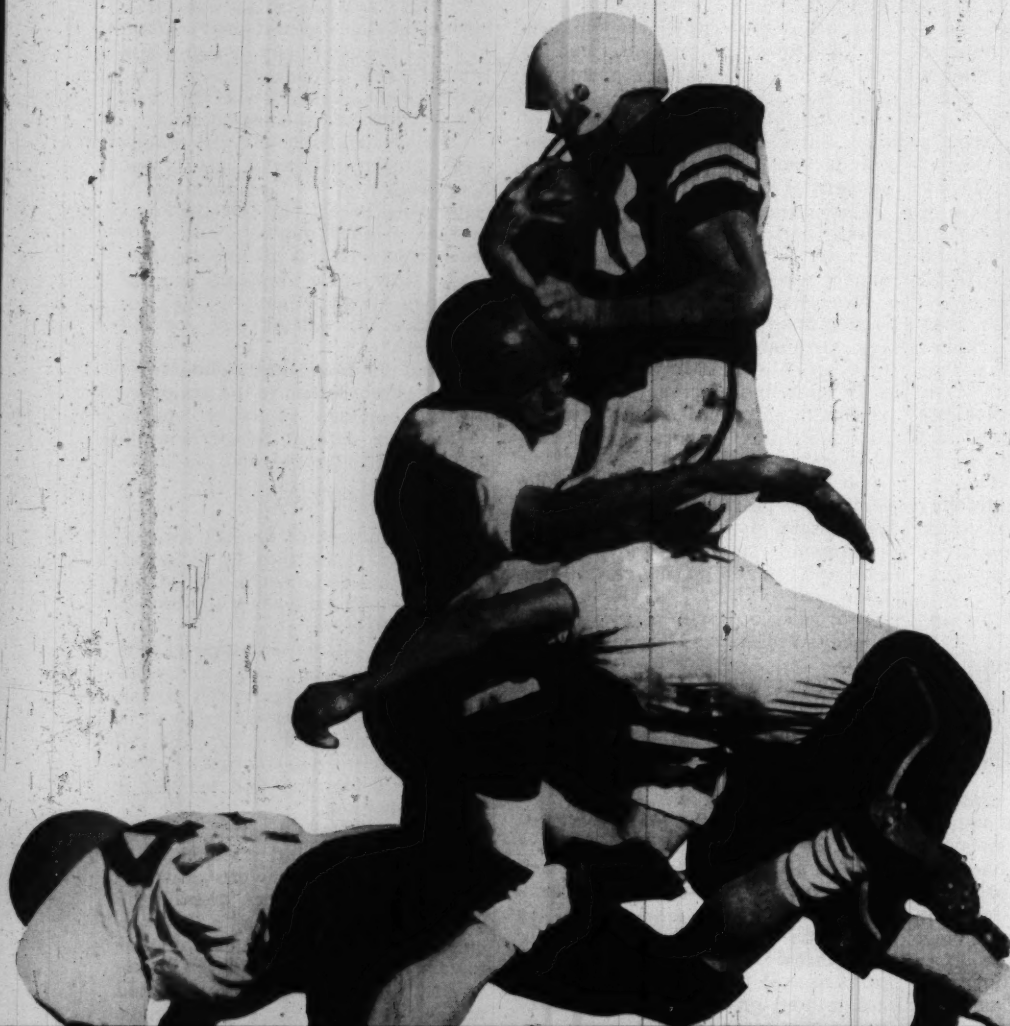
The bewildered Trotters had to explain that no disrespect was intended, that it was simply a stunt. But in future exhibitions, they had to spell this out in a program annotation!

AS for Russian basketball itself—the object of so much curiosity
(Concluded on page 45)


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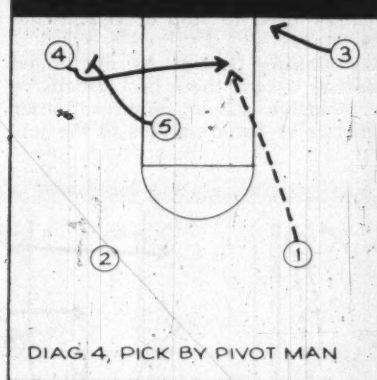
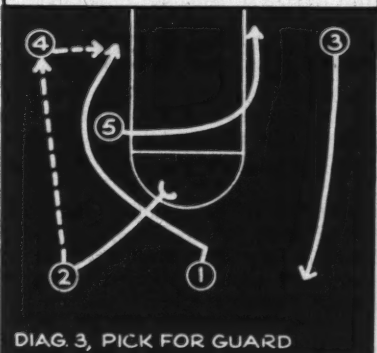
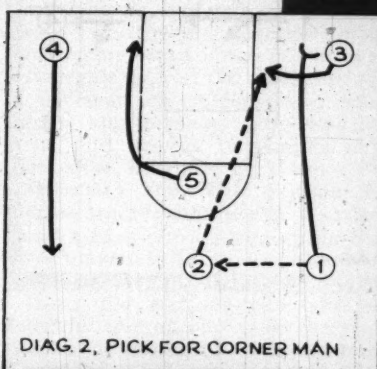
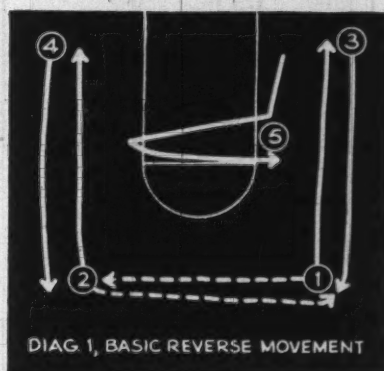
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Reverse Box Offense

By MOE TENER

Coach, Clayton (N. J.) High School

EVERY coach encounters the problem of designing a system that will prove the most productive for his team. No one style of play is best for all teams. The aim is to fit the system to the personnel, not the personnel to the system, for the human element is instrumental in all performances.

In designing an attack against a man-to-man defense, continuous movement of the ball and the rotation of players are essential. Up until two decades ago, a deliberate style with mechanical set plays and extreme ball control was the order of the day.

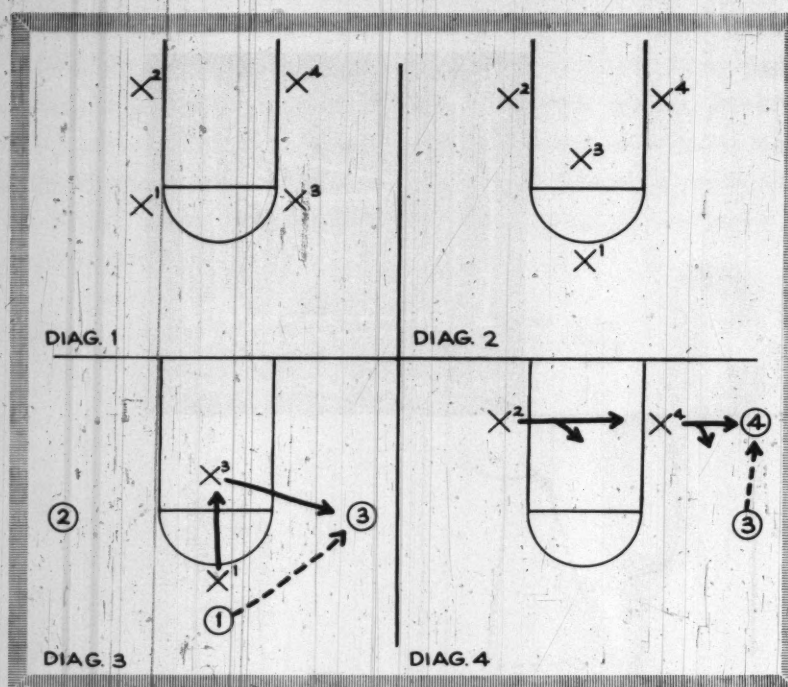
But with the introduction of the switch and the drop back, the "robot"-offense approach lost its effectiveness. To fill the void that developed, the weave offense was instituted and has become extremely popular with coaches on all levels.

What kind of a weave is simple for high school kids to comprehend, not time consuming to install, and doesn't take a great deal of natural ability to function, yet incorporates most of the desirable features of a weave offense? We think the solution may lie in the "Reverse Box Offense."

The formation of the "box weave" is always standard. It's a 2-1-2 set-up with the two best ball-handlers back court, two strong rebounders in the corners, and the pivot man (Continued on page 60)



By **JOHN TOOMASIAN**
Edison H. S., Fresno, Calif.



Defending the Opposing Star

MANY school basketball teams achieve success through the consistent, outstanding performances of one or two players. These so-called "stars" excel to such a degree that *as they go, so goes their team*.

Invariably, the "star" becomes the automatic target of the opposition. After the "star's" attributes are assessed, the opposing coach will proceed to map strategy to stop him. Naturally the coach will attempt, first, to capitalize upon the ace performer's weaknesses. But when these are either few or lacking, he must proceed in other directions.

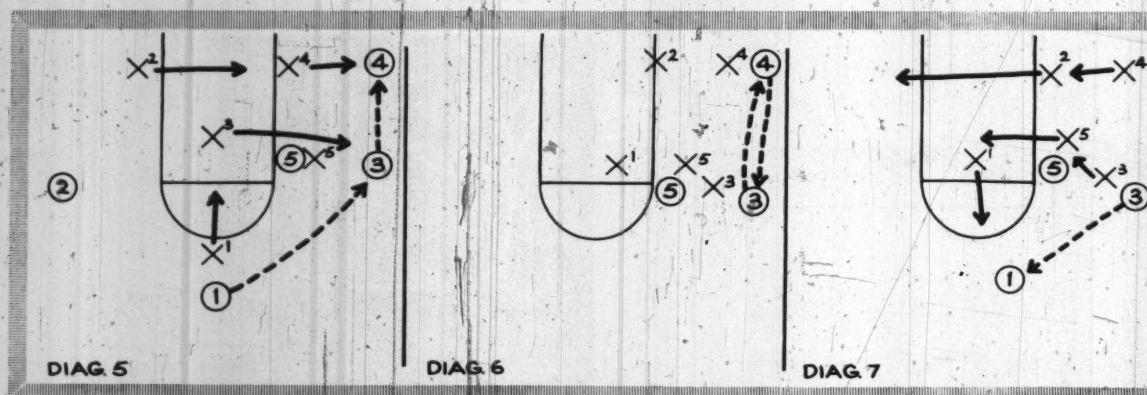
One specific direction, for example, is to assign his best defensive player to "stop the star" at practically all costs; while another is to assign two and even three players to do the job, gambling that they can

ignore one of the weaker players who isn't much of a threat.

Although good defensive or rebounding stars are unique and relatively difficult to stop, opposing coaches tend to utilize every conceivable means to cripple the effectiveness of such publicized offensive stars as "play-makers," "ball-handlers," and "high-scorers."

Our purpose here is to explain the defensive tactics which we've successfully used to stop or reduce the effectiveness of such "stars."

Defending the Play-Making Guard: As mentioned previously, some coaches assign their best defensive player to the key offensive player, whereas other coaches might assign two or three players to the job.



From these conventional tactics, coaches have administered other tactics to "stop the star", but they've rarely ever developed a foolproof plan which might be applicable to all situations.

At Edison High School, a member of the stronger leagues in the San Joaquin Valley, Fresno, Calif., we've utilized the basic principles mentioned above, but have added the principles of the combination man-for-man with zone defense to them. In practice and theory, this man-for-man with zone defense involves a modified four-man zone which supports a player specifically assigned to guard the so-called "star."

To stop the play-maker, we assign our best, speediest defensive man to harass him all over the court with or without the ball. Since the play-maker's effectiveness is centered on directing the offense, we seek to destroy this function by supporting our defensiveness with a simple box zone as shown in **Diag. 1**.

Recognizing that the chief role of the play-maker is to penetrate the defense, we concentrate on, first, forcing him to make bad passes by continual harassment; and, second, two-timing him on either of his blind sides with players 1 and 2.

Defending the High Scoring Post: Again, some coaches traditionally assign their best defensiveness to guard a high-scoring center, but they usually collapse other players in front and behind him or simply use a collapsing zone around him.

Using the man-for-man with zone principle, we delegate one of our taller defensiveness to defend against the center man-for-man and support him with a modified 1-1-2 zone as shown in **Diag. 2**.

Although it's not unusual for a team to have another scoring threat from the outside to complement the high-scoring post, we've found that the 1-1-2 zone is effective in this situation as well. We acknowledge both with a man-for-man on the high scoring center and the 1-1-2 zone on the remaining four players, with emphasis (virtually man-for-man) on the added outside threat.

For purposes of clarification and expediency, this combination threat will be discussed in detail later on as it's imperative that the mechanics of the 1-1-2 zone be treated at this time.

The key to the 1-1-2 zone as depicted in **Diag. 2** is based on the standard defensive principles of the three-on-two defensive situation. For example, in **Diag. 3**, x-1 and x-3 form the first defensive unit, whereby x-1 must stop the dribbler while tandem teammate x-3 attacks the player on the side who receives the first pass. After the pass, x-1 retreats to a sagging position on the free-throw line.

In **Diag. 4**, x-2 and x-4 are shown as they form a

second defensive unit in accordance to the three-on-two situation along the baseline. Note that x-2 shifts to cover the free-throw area vacated by x-4.

Diag. 5 shows a standard 1-3-1 offensive alignment against our 1-1-2 zone. Defensive player x-5 maintains a man-for-man defense against high scoring center 5, depending on the location of the player with the ball. Nevertheless, x-5's responsibility is to play a tight man-for-man at all times, while x-1 and x-3 shift in accordance to the pass from 1 to 3, and x-2 and x-4 shift in accordance to the pass from 3 to 4.

It should be noted, **Diag. 6**, that x-5 plays on the inside of 5 whenever 3 or 4 have the ball, while x-1 covers the outside of 5 to form a double-team as well as lane protection.

In **Diag. 7**, the passing of the ball back to 1 from 3 automatically results in x-5 shifting to a position inside the lane on 5 while x-3 shifts back to cover the outside position on 5.

With the passing of the ball from 1 to 2, **Diag. 8**, x-5 and x-3 change defensive assignments: x-5 moves over to cover 2 with the ball, while x-3 assumes the responsibility of defending against post 5 on a man-for-man basis. In short, x-5 has exchanged positions with x-3, the former playing in the 1-1-2 zone while the latter plays the man-for-man. This constitutes the only real radical change.

To the opposition, the aforementioned maneuvering reflects a zone defense, usually interpreted as a shifting 2-1-2 zone, but in reality it's a combination man-for-man-zone designed to stop 5 with x-5 (and if necessary, x-3) and a 1-1-2 zone to stop the other four players, including any other outside shooting threats.

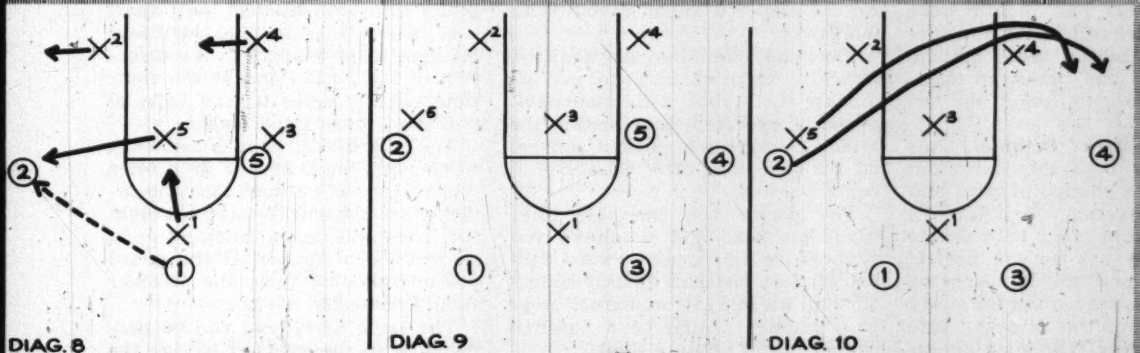
Defending the High Scoring Forward: Assuming 2 is the offensive star forward, **Diag. 9**, we employ the same 1-1-2 zone on the other players while assigning our best defensive player to 2.

Although we attempt to stop or discourage 2 from receiving the ball, any completed pass to him automatically results in flanker protection from x-3 and x-2, who shift with the first pass. However, the chief responsibility falls on our man-for-man defender, x-5. Meanwhile, x-1 sags back to protect the lane.

Any attempt by 2 to cut for the basket or overload, **Diag. 10**, merely adds to the responsibility of x-5 who must follow him man-for-man all over the court. Moreover, on the overload side of the court, x-5 can depend on flank protection from x-1 and x-4, corresponding to the same flanker protection provided by x-3 and x-2 on the opposite side of the court.

Defending Two Stars: These threatening duos can be combination guard-forward, center-forward, or center-

(Continued on page 56)



BEHIND-BACK DRIBBLE



By PRESS MARAVICH, Head Coach, Clemson College

Special-Situation Stunts

PART 2

ILLUSTRATED last month were the defensive roll, inside and outside reverse, button hook, dribble with full spin, and two-hand overhead shot. Now to round out the repertoire:

Behind-the-Back Dribble: This dribble, using both the right and left hands as a change of pace and change of direction, is neither a "showboat" stunt nor a hard one to master. Nearly anyone can perfect it with daily practice. It keeps the defense honest, preventing the guard from pressuring the attacker into hurrying his play. The good defensive man will hold a healthy respect

for the player who can execute this maneuver.

Fake and Shot: Many players have difficulty learning how to get set quickly for a shot. This maneuver, properly executed, will enable the attacker to get set quicker and get off his shot with little chance of it being blocked.

The player (on the side line) feints his head and shoulders and at the same time steps forward with his left foot. He then quickly shoves off with his left foot and cross-steps in a manner similar to a baseball runner taking off on a steal.

He catches the pass from the op-

posite line with his feet well apart—a little wider than his shoulders. He then fakes the ball in the direction of the basket and at the same time slightly spins on the balls of both feet toward the hoop.

The guard will have a tendency to go with the fake and drop off a foot or two. If he does this, the attacker should quickly drop his right foot back and take a quick set or, if he prefers, a jumper. If the guard doesn't take the feint, the attacker should drive for the hoop.

The same movement can be perfected with the attacker having the ball to begin with. The player first



feints with the ball, then dribbles to his right with his right hand. After dribbling the ball low to escape the guard, he stops at the side of the foul circle and lets the ball bounce hip high by his right side.

He now drops his left leg back as before, ready for the shot. He pretends he's going to stop, then suddenly breaks for the basket for a driving layup. Remember, it's most important to spin on the balls of both feet toward the basket.

Spin for Layup: How many times have you seen a player dribble toward the post or pivot area and, once stopped, have the defense swarm all over him—preventing him from getting off a shot? He then must pass to the backcourt to be safe. This is an excellent illustration of a point-of-thrust failure.

Irrespective of the direction the player dribbles from, his body (when he comes to a stop) should be slightly bent forward with the knees flexed. He then fakes a pass and spins 360° off the ball of his

right or left foot, whichever is advanced, to free himself for the layup. If the left foot is advanced, he spins off that foot in clockwise fashion.

Spin and Cut: Another common situation which presents an opportunity for scoring occurs whenever the defense sloughs off 10 to 15 feet. The average attacker will invariably start feinting and cutting for the hoop or post position—right into the hands of the defense. Knowing how to break free in this situation is an art, and this drill will help perfect it.

The offensive player nonchalantly walks toward his guard, getting as close as possible. The closer he can get, the better are his chances of breaking free. If the approach (as he walks) is made with the right foot extended, he quickly spins counter-clockwise to free himself.

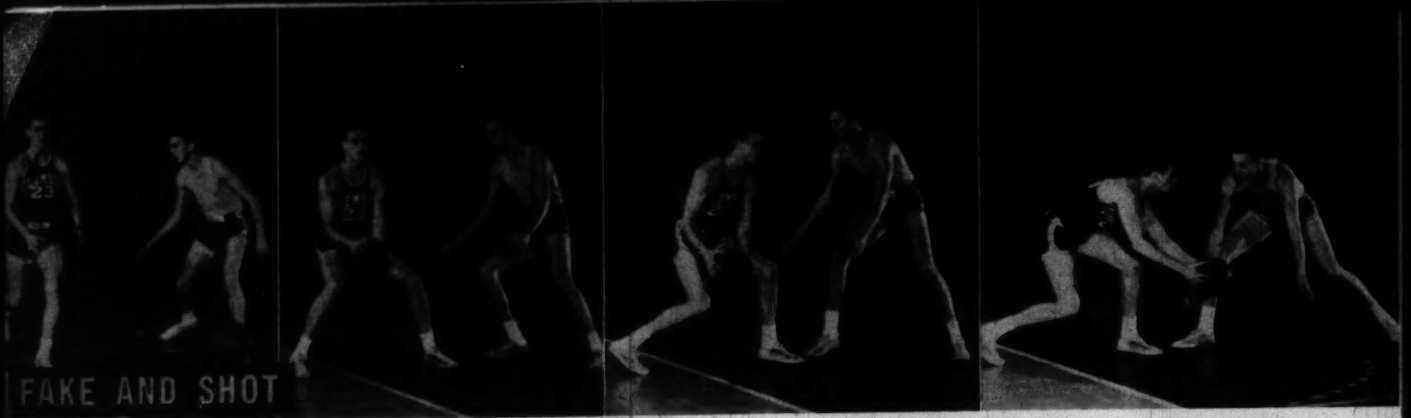
The reason for this type of maneuver is obvious. The modern defensive player plays an angle defense and can be often caught watching

the ball. If the right foot is advanced, the attacker cuts toward the foul line. If the left foot is advanced, he spins and goes toward the basket.

Drop-Step and Drive: The player's feet are spread about the width of his shoulders, facing the basket. The attacker fakes the ball to his right, extending both arms but keeping the feet stationary. If the defense doesn't take the first fake, the attacker can drive right by him for a layup.

If the guard takes the fake, the offensive player brings the ball back toward his left hip and drops his right foot back simultaneously. In other words, while the player is bringing the ball back to his left side, his right foot is dropped back toward the heel of his left foot. The player then drives off with a right hand dribble and a cross-over step.

Remember, if the player fakes to his right, he dribbles to his right—or in the direction he feints with the ball.



FAKE AND SHOT



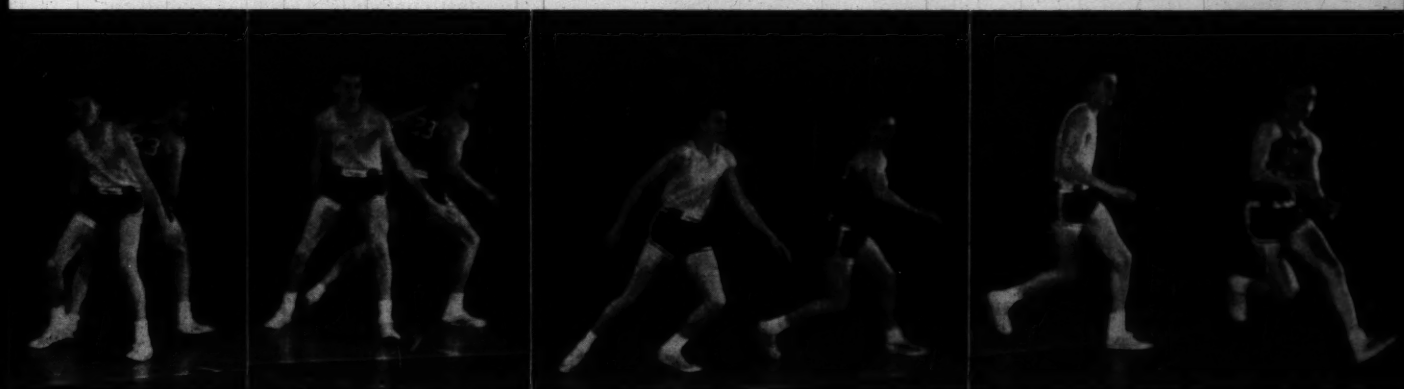
SPIN FOR LAYUP

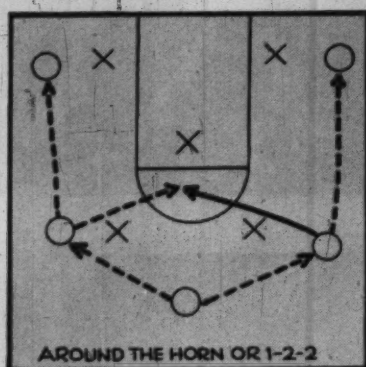


SPIN AND CUT

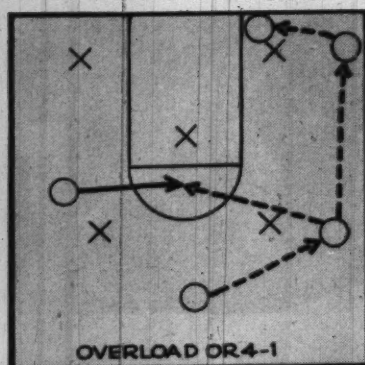


DROP-STEP DRIVE

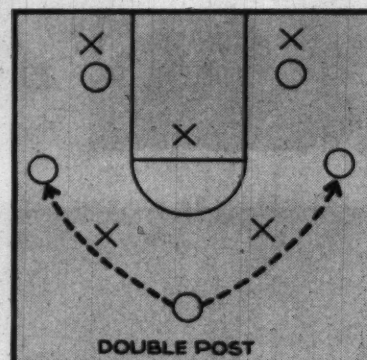




AROUND THE HORN OR 1-2-2
Depends mainly on set shots with an occasional cut across.



OVERLOAD OR 4-1
Places four men on one side of the court and one man on other. Ball is passed on overloaded side until zone is overshifted, then ball is passed quickly to weak side. Can work on both sides of court.



DOUBLE POST
Excellent attack when two big men are available. Big men are placed on sides of foul line. This concentrates the zone and provides strong offensive rebounding.

ZONE Defense and Attack

THE inception of the 12-foot lane has popularized the zone tremendously. Since so much of the vital under-basket area is now verboten for more than three-second occupancy by the offense, defense has received a definite flip and coaches feel obliged to exploit the big lane.

They also feel that a zone isn't as costly on their players; that is, via fouling. It's quite obvious that when your men are playing man-to-man they'll be constantly moving and thus fouling more.

Another reason for the popularity of the zone is that it affords a greater measure of protection against the jump shot. This shot has become so deadly that something is needed to compel the shooters to operate out of their range. Ergo the zone. Most zones protect the foul-line area where jump shooters are most efficient, thus forcing them to shoot from areas which aren't to their liking.

Other advantages and disadvantages of zone defense are enumerated at the end of the article.

The purpose of this paper is to

familiarize coaches with the various phases of zone play: basic principles of zone defense and offense, planned attack of zones, and the advantages and disadvantages of zone play.

Basic Principles of Zone Defense: Every coach should include some sort of zone defense in his planning. He may possibly never have the opportunity to utilize it, but if he can effectively use a zone the one time he needs it he'll be rewarded for all the time he spent teaching it.

Actually, there are two types of zones. First is the "active zone" whereby the front and wing men pick up high and go all out in trying to intercept or harass the passers.

Second is the "passive zone." Here your chasers or front men drop back and concede the outside shots, and concentrate on stopping the close-in shot and getting the rebounds.

In picking your personnel, carefully select your chasers, middle man, and rebounders.

Your chasers should be quick, fast, and possess the ability to anticipate and steal passes. They needn't be too tall.

Your middle man should be agile, being able to cover the foul-line area in the event any drivers get by your front men. He should be tall and have a good spring so as to block and rebound. He should be fast enough to drop back and cover underneath whenever the back men or rebounders go out to the corner to cover an offensive player.

Your rebounders should be strong, tall, and fast enough to cover the corners. They should also be trained in getting the ball away quickly once they get the rebound in order to start the fast break.

Once you've picked your personnel and their relative positions, the first principle to teach is to *play the ball*. All men should face the ball; they should know where it is at all times and know the approximate positions of the offensive men. Your back men can inform your front men and middle man as to where the offensive men are coming from.

Next, try to block out all passing lanes by either occupying them or by anticipating passes in those areas. Keeping your hands up will help you in this phase. By putting pressure on the passers, you may force them to throw bad passes; and by clogging the middle and baseline, you can stop their drive-in shots.

In the event your opponent has a good scorer, you can make it tough on him by either overplaying him or applying pressure by double-teaming him.

After all shots, have your re-

By **LOU CARNESECCA**, Asst. Coach, St. John's University (N. Y.)

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bounders ready to block out and start your break. You may gamble a bit by sending one of your front men down the court, if you see you have a good chance of getting the rebound.

If by chance your opponents are using a pivot man, you can neutralize him by having your middle man and back men float in front of him.

You should also be aware of any attempt by the offense to get in behind your back line for "sucker shots" and causing your men to commit foolish fouls.

By constant practice and review of your zone play, you and your players will know the proper defensive switches, weaknesses and strong points of the various zones. But all these principles will be worthless unless your men hustle and get back fast ready to set up. One man lagging can spoil your whole defensive zone play.

Basic Principles of Zone Offense:

The three common methods of operating against a zone are:

First the fast break; that is, beating the defense down the court before they have a chance to set up.

Second, surrounding the zone and taking outside shots. In this instance, your percentage has to be rather high to be effective.

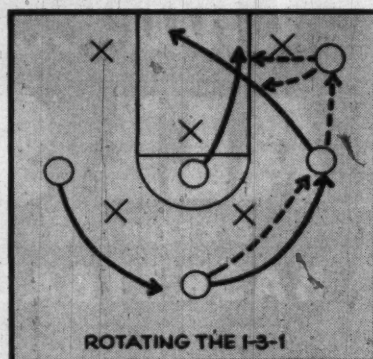
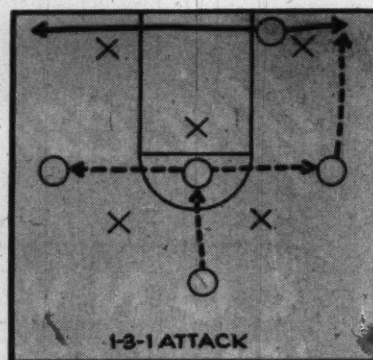
Third is the "planned attack." Here we set up our men in certain positions where the zone is weak and by passing the ball and moving our men around we try to get good shots.

The first basic principle is to determine whether the opponents are playing a zone. This is accomplished by sending a man through the middle or exchanging your front men. If your men aren't picked up by the defense, then you know your opponents are playing some sort of a zone.

When you realize a zone is being played, you must next determine what kind of a zone is being used—3-2, 2-3, 1-3-1, 1-2-2, etc. Then you must set up your offensive pattern accordingly. There's no need to waste a time-out; you should merely call out your offensive attack. Your pre-season preparation should have you prepared for this eventuality.

Once having called out your attack, your men should pick out their passing, shooting, and rebounding spots. They should be facing the basket ready to shoot, pass, and maneuver.

Train your men to be deliberate and not to force their shots. They should only take good percentage shots. Your passes also shouldn't be forced. They should be short and snappy, with emphasis on the bounce



Good attack to open and free side man; also a good post attack, as he can wheel or take a jumper as he receives ball. No. 4 moves to side of the original pass.

and overhead passes.

You can feint the defense out of position by faking before you pass (lots of "string"). Eliminate lob and cross-court passes, as they're easy prey for the defense.

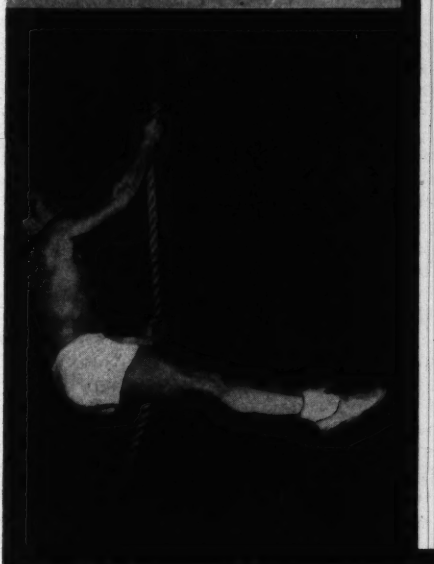
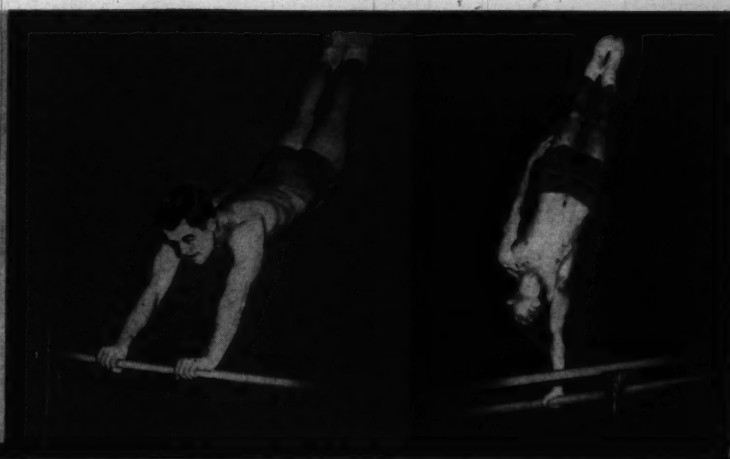
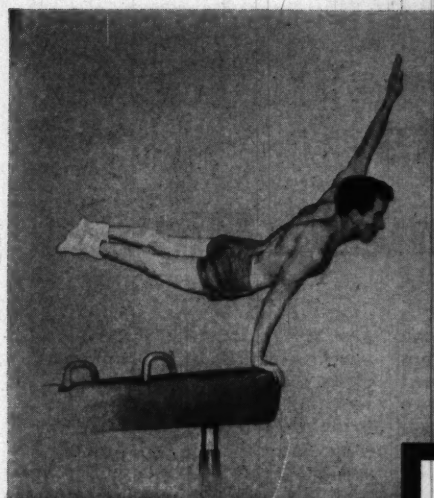
As for your actual attack, try to create two-on-one and three-on-two situations. Limit your drives to only when you have a quick opening. Your screens won't be as effective as against man-to-man.

Don't bounce the ball as soon as you get it, but rather save your dribble. Use it to avoid an opponent, create a situation or score.

Have your back men break out from behind the defense, as this will put them in better position to receive the ball. Try to concentrate or back up the defense with your passing, in order to get short shots around the key.

On shots have the man opposite the attempt follow up. Always maintain your balance by having two men back and three men rebounding. In your pre-game skull session, make sure you cover the opposition's potential defensive moves so as to play away from their strength.

(Concluded on page 41)



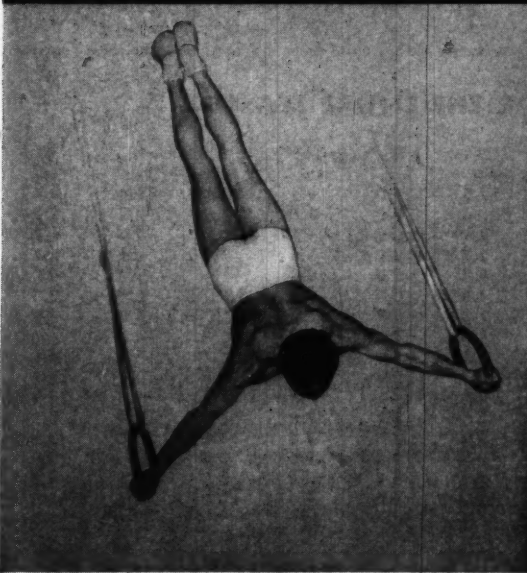
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Ten Commandments for Tournament Play

SEVERAL years ago I heard an old pro say to a young golfer after he had just made a miserable drive: "It's not how you drive but how you arrive that they put on the score card."

This thought can also be applied to present day coaching. Fans have a tendency to forget the early season games, but they long remember your loss in the first game of the tournament. When I first entered the coaching profession, my aim was to have my teams finish strong, and tournament winning is indicative of this.

Your philosophy of coaching must be directed toward winning in tournament play if you hope to reach the finals consistently. Listed below are our ten commandments for tournament play. We've applied these principles for the past several years and they've produced gratifying results.

1. The first day of fall practice is the time to point your squad toward the tournament, and you must constantly remind them that you're going to take the gold medals home at the conclusion of the conference tournament.

You must be willing to look rag-

ged during the early stages of the year in order not to bring your team to a peak too early and to prevent late-season staleness. We never have a full-game scrimmage more than once or twice before our first game. As a matter of fact, we do very little scrimmaging early in the year.

2. Condition will be the difference after the first night of the tournament, so keep your squad physically and mentally sharp. You can accomplish this by concentrating on fundamentals and continuing to run them during the entire year. Basically we stick with our fundamental drills until they become part of our conditioned responses. It's unwise to practice your offensive patterns too early in the season. We go very slow and try to master every detail of every play before we move on to the next one.

3. You should occasionally take chances and change your strategy during early season to assure you of proper results at the end of the year. I often change my line-up and experiment with new offenses and defenses in the early stages of the regular season.

My experience has been, that if

you try to win the regular season championship with the same enthusiasm that you must use during tournament play, your squad will have a tendency to go stale regardless of your efforts. The only successful method that has alleviated our staleness has been the employment of a normal approach to regular season games, saving for an all-out effort during the tournament.

4. You must instill confidence in your team members early in the year, and help this confidence grow with each practice and game. I've found that by placing emphasis on continuous improvement, my squad members tend to relax.

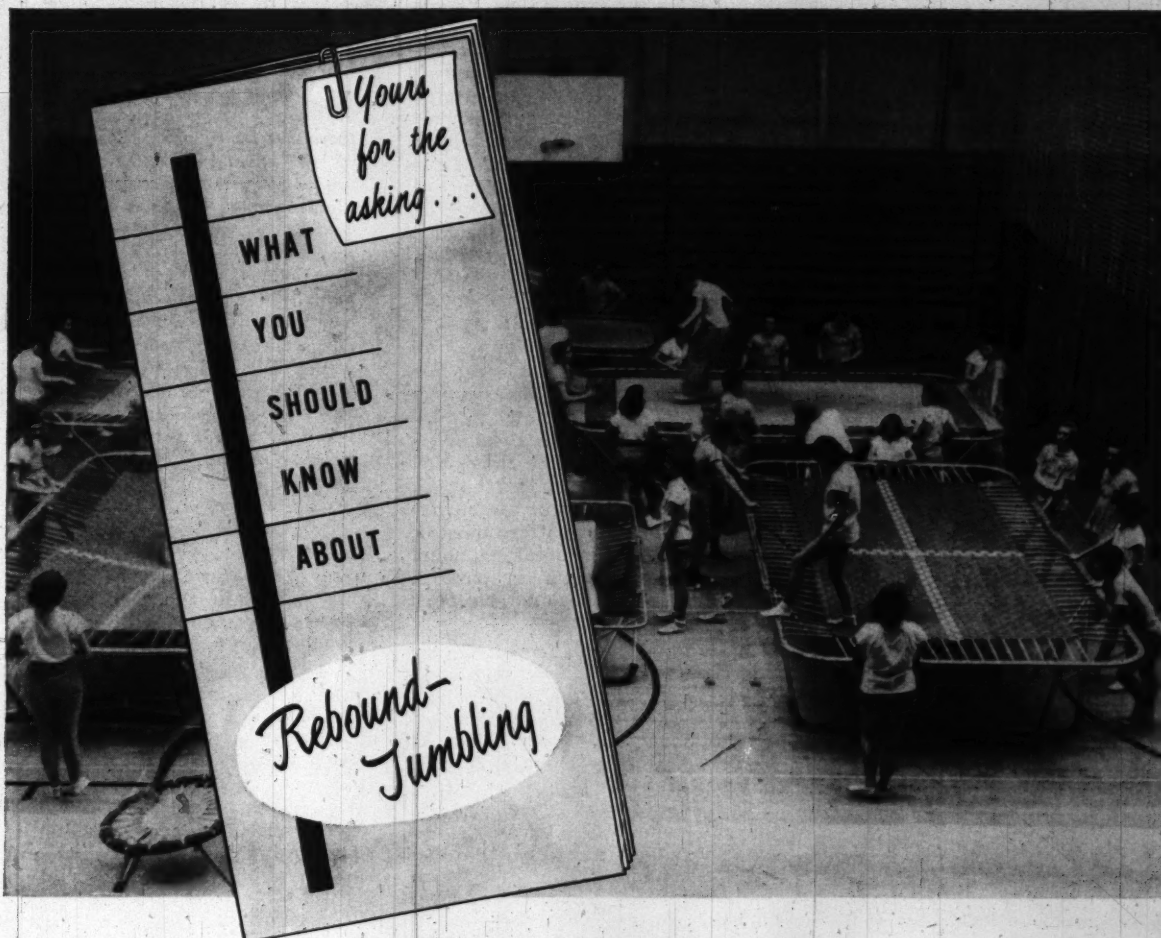
Forcing the learning process may create mental and physical blocks. Some coaches pressure their teams into being the best in the state during December, and end last during March.

5. Play a very rough non-conference schedule. If feasible, play teams from different sections of the state or country in order to familiarize your team with unusual conditions. It's a good practice to play away from home as much as possible in order to cure your team of that old

MASTER PRACTICE SCHEDULE FOR THE ENTIRE SEASON

Type of Drill	% Oct.	% Nov.	% Acc.	% Dec.	% Acc.	% Jan.	% Acc.	% Feb.	% Acc.	% Year
Spot Shooting	19.0	17.9	18.4	19.2	19.3	19.0	19.1	20.3	19.4	19.4
Fundamentals	11.3	0.0	4.6	0.0	3.4	0.0	2.6	0.0	2.2	2.2
Ind. Off. Work	5.4	.8	2.7	0.0	2.0	0.0	1.5	0.0	1.3	1.3
Un-Balanced Drills	5.9	.8	3.2	0.0	2.3	0.0	1.8	0.0	1.5	1.5
Balanced Drills Off.	9.5	8.1	8.7	8.9	8.8	5.6	9.1	10.3	9.4	9.4
Offensive Drills	7.1	4.9	5.8	.7	4.5	0.0	3.5	0.0	2.9	2.9
Rebounding Def. & Off.	8.3	5.7	6.8	8.9	7.3	9.2	7.8	11.0	8.3	8.3
Fast Break	3.0	4.6	4.4	6.8	5.0	4.3	4.8	3.4	4.6	4.6
Ind. Def. Moves	1.8	7.2	5.3	6.2	5.5	4.9	5.4	.7	4.6	4.6
Team Defense	0.0	13.0	7.8	13.0	9.1	12.3	9.8	11.0	10.1	10.1
Scrimmage	2.4	11.3	7.8	15.1	9.7	14.8	10.8	15.1	11.4	11.4
Special Situations	0.0	3.6	2.2	2.7	2.3	3.7	2.6	4.1	2.9	2.9
Press & Freeze	0.0	3.6	2.2	3.4	2.5	4.3	2.9	6.8	3.6	3.6
Foul Shooting	9.5	9.0	9.2	9.5	9.3	11.0	9.6	9.6	9.6	9.6
Running Steps	9.5	6.9	8.0	5.5	7.3	5.6	6.6	6.5	6.6	6.6
Ind. Extra Work	6.5	1.2	3.4	0.0	2.5	0.0	1.9	0.0	1.6	1.6

The symbol "Acc" refers to the percentage of time accumulated to that month.



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familiar disease known as "home flooritis."

6. Try to participate in a Christmas or an early season tournament if at all possible. If you cannot play in a mid-season tournament, schedule a road trip and play three nights in a row, creating conditions corresponding to those of tournament play. Make every effort to play on floors similar to the one on which the tournaments will be played.

7. I always develop a new offense and defense for the tournament, if the need arises. I've found it best not to change your attack against an underdog team. But, it may be advisable to alter your plans against equal or better teams.

8. You must establish a rigid routine before tournament time. You should start working on this the very first day of practice, but by tournament time the habit pattern must be formed beyond the breaking point. Your principal, manager, parents, bus driver, and everyone else must help on this project.

Many tournaments have been lost because some boy failed to report on time the day of the tournament. You generally have to leave a boy behind during the early season to prevent this from disrupting your tournament plans.

9. Frame of mind is the most important factor connected with winning tournaments. You can stabilize this by developing confidence during the year. Furthermore, you can, through routine work, help create a relaxed atmosphere which will in turn reduce tension.

NUMBER ONE FACTOR

I feel that mental state is the number one factor of tournament play and you must convince your team that they're ready, freeing their minds from additional apprehensions. You must be convinced yourself that there's an emotional difference between regular season and tournament play and strive to face this problem.

10. Drill to prevent surprise. We work the last three weeks of the regular season on adjusting our offense and defense to every unusual situation that we may face. We work long and hard against the press, change of tempo, odd defenses, strange offenses, and any other situation that we might encounter. I feel that if my team is surprised during tournament play, I've failed them as a coach.

About the only thing we do the last week is recheck our offense and defense, drill on all special situations and go over our last minute

INCREDIBLE is precisely the word for Bob Davis's tournament record. During the past eight years, his teams have participated in 23 tournaments, reaching the finals of 18—winning 9 and finishing runner-up in the other 9! They've also reached the finals of their conference tournament in 7 of the past 8 years. Last year Georgetown went to the semi-finals of the N. A. I. A. tournament, with Coach Davis achieving the supreme accolade of being named "N. A. I. A. Coach of the Year." A graduate of the Class of '50, he spent three years at High Point College in North Carolina before returning to his alma mater six years ago.

phases of the game. Never put anything new into the last week of practice. If you do, it will only confuse your own team members.

The proper use of daily practice time is a vital factor in helping win tournaments. You should prepare a yearly practice schedule which contains the proper breakdowns of time allotment into individual activities.

I use my master practice schedule for reference many times during the year. I've analyzed my time and know how much we must spend on each phase of the game. If we fail to make normal progress, we change the regular season practice schedule to expedite our catching up by tournament time.

Often we must even work hard the day before a regular season game, but we're thinking about the tournament and the boys realize this. We never become too disturbed if we fail to impress the fans during regular season games, because we're thinking in long range terms.

DON'T FOOL YOURSELF

In summing up our approach to tournament play, I realize that I've mentioned many things that most coaches know. But here's the important thing: Don't fool yourself. We coaches often do this. If you want to win during the tournament, then start thinking in those terms now and point your coaching in that direction.

Have the courage to decide in favor of tournament winning when you approach decisions that might involve either winning or losing regular season games. Before you can sell your squad, you must sell yourself.

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Correctly adapted, it not only can save considerable coaching time and effort but can improve the exact details of execution, thus making for a more efficient learning process.

In adapting the Buddy System to the teaching of free-throw techniques, we first divide our squad into units of two players. The personnel of these units is altered from time to time to (1) help hold the players' attention and whet their interest as much as possible by adding variation; (2) to keep them "honest" in their count of attempts and conversions; and (3) to avoid the formation of cliques within our squad.

These units are spread around our six baskets and a clockwise or counter-clockwise rotation is established. During the season, we occasionally reverse this rotation to keep the situation as new and varied as possible.

At the beginning of our practice sessions, we explain in detail the free-throw mechanics and discuss how we use the player who's the non-shooting half of the buddy team at the moment.

He watches for any errors of omission or commission, points out such mistakes immediately to the shooter and then checks carefully for the correction of the error. This is his major responsibility, although he also helps keep the count and returns the ball to the shooter on the line.

We direct our free throwers to step back off the foul line after each shot and then step up again and take a new stance rather than keep their feet "planted" at the line.

We believe that this routine of "getting their sights zeroed in," starting each time "from scratch," is of definite help in training the eyes, brain, nerves, and muscles to adjust rapidly and successfully to the game situation; and that consequently the response demanded of

TWO-HAND OVERHEAD FOUL

Dolph Schayes, Syracuse Nat star, demonstrates the form that has made him one of the two or greatest three foul shooters in the business. He shoots it in the same manner as his set shot. Holding the ball at the sides, with fingertip control (palms off the ball), Dolph trains his eyes on the rim. He bends his knees slightly, brings the ball above and in front of his head, and releases it with a wrist flick. Note how he rises on his toes as he straightens his legs, how the arms straighten out, and his palms follow through to the basket.

him during the actual game becomes something of a pre-conditioned reflex, learned during practice, of assuming the correct stance, mentally estimating the exact distance and arc which the ball must travel, and resulting in correlated muscular reaction—a successful shot.

We shoot our free throws in groups of five successful attempts, each team moving to the next basket when they've completed five. The rotation thus necessitates adjusting to several different baskets during each practice rather than continuously firing at some favorite hoop.

It has the further advantage of allowing the coach to split up this part of his practices into convenient intervals and to sandwich the shots in between other phases, such as during the free times when his players are taking a breather between drills or scrimmages.

The grouping in units of two (occasionally three may be necessary) provides these advantages:

1. Someone to return the ball rather than have the shooter "shagging his shots." This conserves the

(Continued on page 39)

By LEE FOX, Former Coach, Rochester Institute (N. Y.)



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What About Wheat Germ?

By THOMAS KIRK CURETON

Director, Physical Fitness Research Laboratory, University of Illinois

IS WHEAT GERM an ergogenic food—that is, does it give an athlete more power and endurance?

Many coaches and athletes seem to think so, and repetitive studies at the U. of Illinois physical fitness research laboratory indicate that wheat germ or its derivative, wheat germ oil, aids those who consume it under proper conditions and over a long enough time to enable the body to build up its glycogen (muscle fuel) reserve.

Meanwhile, many athletes who've made wheat germ a daily diet "additive" have turned in spectacular performances, especially in track and field and swimming. Among them is

Joie Ray, the great middle distance runner of the 1920's. World renowned in his heyday, Ray is just another fellow named Joe to today's sports page reader. But for years on his birthday, he has run a mile against time. On his 64th birthday, Joie ran a mile in 5:30. This time took 36 seconds off the clocking for the mile Ray ran on his 63rd birthday. Now his ambition is a 5 minute mile!

Ray attributes his newly found stamina to the inclusion of wheat germ in his daily diet for several months prior to his 64th-birthday mile. And his physician, Dr. L. F. Ramsdell of La Porte, Ind., seems to agree with him. Knowing Ray was consuming wheat germ daily, Dr. Ramsdell also, for medical reasons, administered some calcium injections. Later, he said: "I don't know how wheat germ helps Joie, but it seems to do the job."

Another wheat germ disciple is Eddie Beck of Cincinnati, who in December of 1958 broke the 100-yard junior backstroke record in the National A.A.U. meet in Ann Arbor, Mich., with a clocking of 59.8 secs. Eddie attributes his record-breaking prowess to wheat germ, stating, for real or fancied reasons, "wheat germ is remarkable in what it does for young athletes striving for stamina."

The Australian swimmers, who rewrote the record book in the 1956 Olympics, are known to have included wheat germ and wheat germ oil in their training diet for several months before the Olympic competition. So does Herb Elliott who runs those amazingly fast miles on the cinder path. A sample Elliott breakfast, the daily press reports, is uncooked rolled oats mixed with wheat germ, walnuts and chopped fruit (bananas, dried figs or raisins).

Wheat germ is also given some credit for the remarkable performance of Dave Mills of Lakewood, O., who, in the 1958 Ohio state prep track championships, won the 100-yard dash in 9.7, the 220 in 21.2, and the 440 in 46.6. His coach at Lakewood, Carl B. Antel, has reported

"wheat germ was added to his (Mills') diet and he used it daily."

We can recall, too, that after we reported on our experiments with wheat germ and wheat germ oil to the Sports Medical meeting in Melbourne, Australia, just after the 1956 Olympics, Gunson Hoh, a Chinese athletic leader, said his athletes needed such foods. And he expressed wonder at what Bobby Morrow, Olympic champion in the 100 and 200 meter dashes, would do when he began to eat wheat germ.

Hoh was surprised when I told him that Morrow had the advantage of just that type of feeding.

WHY DOES WHEAT GERM HELP ATHLETES

We haven't as yet isolated the factor in wheat germ which seems to increase power and endurance. Maybe, actually it's a combination of factors. A study of the accompanying wheat germ nutritional assay shows the cereal is almost a complete food. It's a rich source of good quality protein and carbohydrate, and is well stocked in vitamins of the B-complex, iron, phosphorus, vitamin E and several other nutrients not found abundantly in other foods.

It could be all of the nutrients working together in the natural formula, or it could be one or several of the nutrients working directly, and under catalytic influence of other nutrients in the heart of the wheat.

The cereal, also, is the source of wheat germ oil, a poly-unsaturated fatty acid (oil) which is rated as one of the best for nutrition of the heart, blood vessels and working muscles (the heart and blood vessels are muscles, too). Each ounce of wheat germ cereal, for example, contains 1.5 grams of linoleic acid, which converts to arachidonic acid within the body, and then to, glycogen, the prime muscle food during work.

Recent Ph.D. research (R. H. Pondorf, Lawrence Golding and Guy Metevier) done under my supervision at the Illini physical fitness research laboratory shows that the higher blood cholesterol levels are, the poorer are several important physical fitness tests. Meanwhile, medical research indicates linoleic acid reduces cholesterol levels in the blood.

WHEAT GERM ASSAY

Nutrient	Potency Per Ounce	Source Value
Linoleic Acid	1.6 gm.	Excellent
Inositol	288. mg.	Excellent
Choline	136. mg.	Excellent
Thiamine	.49 mg.	Excellent
Pyridoxine (B ₆)	.28 mg.	Excellent
Riboflavin	.18 mg.	Good
Niacin	1.22 mg.	Good
B ₁₂	3. mcg.	Excellent
Vitamin A	30 I.U.	Trace
Vitamin C	3.6 mg.	Fair
Mixed tocopherols (Vitamin E)	10. mg.	Excellent
Folic Acid	.10 mg.	Excellent
Protein	9.5 gm.	Excellent
Carbohydrate	12.75 gm.	Excellent
Iron	2.43 mg.	Excellent
Phosphorus	317. mg.	Excellent
Sodium	1.21 mg.	Low
Para Aminobenzoic Acid	10.6 mg.	Good
Calcium	9.45 mg.	Trace
Pantothenic Acid	.33 mg.	Good

In addition, one ounce of Kretschmer's Wheat Germ contains: potassium, 270 mg. — magnesium, 89 mg. — cobalt, .7 mcg. — copper, .30 mg. — manganese, 4.82 mg. — zinc, 4.79 mg. — molybdenum, .016 mg. — ash, 1.34 mg. (4.75%) — crude fiber, .51 gm. (1.79%) — moisture, .89 gm. (3.14%) — and fat (50% linoleic acid), 3.40 gm. (12%).

Wheat germ assay (except for linoleic acid) made by Wisconsin Alumni Research Foundation. Linoleic acid assay by Department of Agriculture, University of Illinois.



To the man behind the team...

Successful new concepts in physical training and coaching methods include adding *wheat derivatives* to the athlete's diet for *endurance plus*.

The most nutritious of these wheat derivatives is Kretchmer Wheat Germ. A *natural*, all-purpose food, it provides many of the nutrients that are essential to all around good health. Consumed regularly, wheat germ also contributes greatly to the efficient utilization of carbohydrates—the energy foods—for *that last ounce of endurance*.

Find out all the facts about Kretchmer Wheat Germ, and why it belongs on your training table. Send for free literature below.

KRETCHMER wheat germ

Write for:

"Suggested Ways of Feeding Wheat Germ to Athletes in Training."

KRETCHMER WHEAT GERM CORPORATION • CARROLLTON, MICHIGAN



One Ounce of Kretchmer's Wheat Germ Supplies the Following Percentages of Recommended Daily Dietary Allowances

NUTRIENT	MALE			
	age — 10	16	25	45
Thiamine	38.0%	25.0%	30.0%	33.0%
Riboflavin	10.0%	7.5%	11.0%	11.0%
Niacin	9.5%	6.5%	7.5%	8.0%
Vitamin C	4.8%	3.6%	4.8%	4.8%
Vitamin B ₆	16.0%	16.0%	16.0%	18.0%
Protein	13.5%	9.5%	14.5%	14.5%
Iron	20.0%	16.0%	20.0%	20.0%
Phosphorus	19.0%	16.0%	28.0%	26.0%

Vitamin E. Wheat Germ is the richest NATURAL source of Vitamin E.

Sodium. Wheat Germ is low in sodium. For this reason, it is recommended as a source of good quality protein for persons on sodium-restricted diets.

NOTE: These percentage values are slightly higher for girls and women.

Scoremaster

THE RIGHT BOARD FOR EVERY SCHOOL

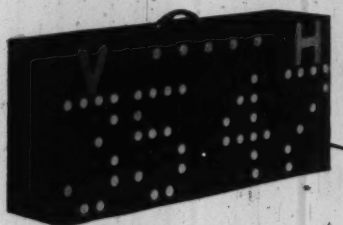
Whatever the sport—whether your gym or stadium is large or small—if a running score is part of the game, there is a Scoremaster electric board tailored to your requirements.



SCOREMASTER 250-6

The great favorite of coaches, players and spectators for scoring basketball.

Overall size 72" x 34" x 6". Letters 5" high. Colored numbergrams 6½" x 10". Split-second accuracy, progressive scoring, automatic timing, complete synchronization, rapid reset, brilliant colors, greater visibility, remote control, easy installation, rugged construction, low initial cost, minimum maintenance.



S-500 SPORTSMASTER

A light weight, low-cost, portable electric scoreboard that answers many problems and needs of both large and small schools.

While designed especially for all types of intramural activities that involve scoring, the Sportsmaster may also be used for varsity practice or in conjunction with large boards, during regular games, to record individual or accumulative team fouls.

Overall size 24½" x 10½" x 5"; weighs but 16 pounds. Plugs into any 110-volt outlet. 7" x 4½" colored numbergrams. Period marker lights. New button-type plastic lenses provide readability to less than 5 degree angle and at distances to 200 feet. Available with or without dial timer. All controls on back panel.

Write for literature on all Scoremaster boards and information on customized boards.

M. D. BROWN CO.
2215 Lake St. Niles, Mich.
"When Split-Seconds Count, Count On Scoremaster"

YEAR (n)	N	GROUP A (Placebos) GREENS	GROUP B (Wheat Germ Cereal) REDS	GROUP C (Wheat Germ Oil) WHITES	GROUP D (Crystals of WGO) BLUES
1955	45	-5.2 (17)	2.6 (20)	5.1 (18)	Didn't use
1956	23	6.3 (6)	9.7 (5)	13.8 (6)	15.8 (6)
1957	70	9.0 (18)	7.0 (19)	11.0 (16)	12.0 (17)
1958	74	2.0 (19)	-1.0 (18)	5.0 (18)	5.0 (19)
Total Improve. (secs.)	212	12.0	18.3	34.9	32.8
Average Yearly Improve. (secs.)		3.02	4.58	8.72	10.93

Improvements in 600-yard run resulting from physical training and dietary supplementation in matched groups of young boys (6-13 years) in U. of Illinois Sports-Fitness School. (Changes in standard scores over six weeks training, combined with basic physical education instruction.)

This latter fact with respect to wheat germ may be of interest to coaches, trainers and athletic directors getting along in years. In addition to being a good source of linoleic acid, wheat germ is well stocked in vitamin E, pyridoxine (B₆), choline and inositol.

Vitamin E, an anti-oxidant, preserves the potency of linoleic acid. Pyridoxine converts it within the body to arachidonic acid, which in turn is converted to glycogen. Choline and inositol aid in the transportation of fat and minimizes its deposition in the blood vessel walls. (Several expensive pharmaceutical preparations are compounded of the same five nutrients.)

Thus, if we can assume wheat germ contributes to lowered cholesterol levels, it should offer an advantage to athletes and "exercisers." We've shown in our laboratory that fat hinders physical performance, especially of the endurance type. Training exercises over a period of several weeks will reduce fat, and cholesterol levels usually are reduced, too.

As a result of the training, oxygen intake capacity goes up, and better scores are achieved in the Harvard Step-Test. Also, better scores are recorded in the strength-per-pound-of-body-weight tested by the dynamometer. Blood pressures after hard physical work are lowered.

DOES WHEAT GERM HELP ENDURANCE?

In a paper reported at the April meeting of the Research Section of the American Association for Health, Physical Education and Recreation, in Indianapolis, we reported the positive effect noticed on a 600-yard run in tests made independently over four years.

On the basis of the best 600-yard running times, the boys in the Sports-Fitness Summer Day School were sectioned into matched groups, Reds (Wheat Germ Cereal, 1 ounce), Whites (Wheat Germ Oil), Blues (Crystals of Wheat Germ Oil, synthetic), and Greens (on Cottonseed oil placebos).

T. K. Cureton and F. B. Roby, "Physical Fitness Improvements Made by Four Matched Groups of Boys in the University of Illinois Sports-Fitness School on Different Dietary Supplements," Urbana, Illinois, April, 1959.

The average age of the four groups of boys were in the same order, 9.25, 8.66, 10.50 and 9.50 years. Over five weeks of feeding and training, with all boys taking the same program, the results are shown for four years of this experimental work in the accompanying table.

NUTRITION IN THE CONDITION OF THE CARDIOVASCULAR SYSTEM

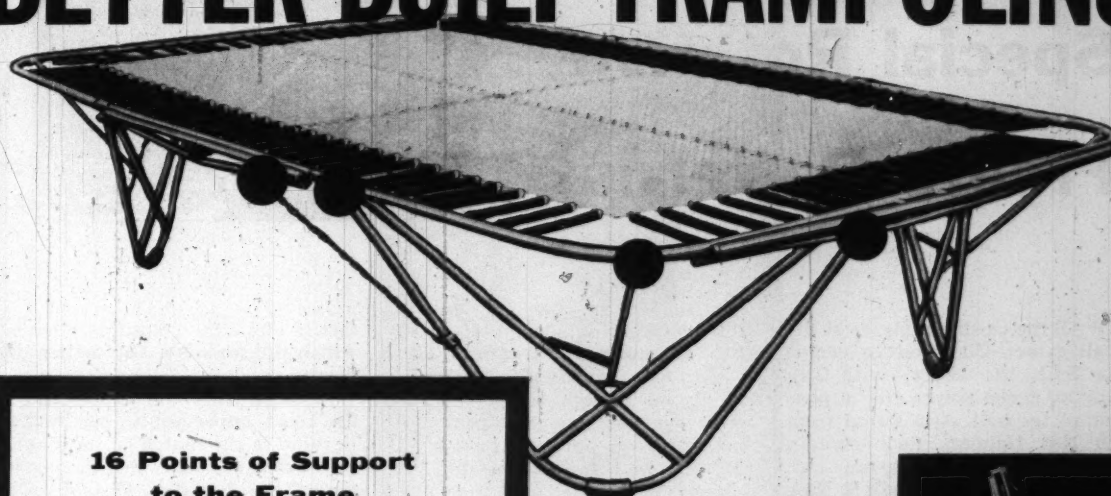
We've observed the "pick-up" in several cardiovascular tests after subjects were placed on nutritional supplements of wheat germ, or wheat germ oil. In case studies run over several years such trends are observed. In my opinion, the condition of the veins and arteries is definitely affected by the wheat germ and wheat germ oil ingredients. Several types of studies indicate this.

Cross reference is made to several of our studies on the synthetic crystals of wheat germ oil, indicating still another substance, not named as yet, but which acts to improve the condition of the blood vessels, both veins and arteries. It's the functioning of these that determines circulation as well as the heart.

The heart cannot eject blood that it cannot get from the veins. Weak and flaccid veins mean poor supply of blood to the heart, and the character.

(Concluded on page 48)

Gym Master BETTER BUILT TRAMPOLINS



16 Points of Support to the Frame

more support than on any other trampoline, eliminates bending and buckling.

Four Separate Leg Sections

far more rigid and durable construction design than on any other trampoline.

No Understructure Beneath Performing Area

absolute safety, available on no other trampoline.

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a one man operation,
TWICE as fast as
other methods of fold-
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with one turn of the
wrench, precise bed
tension from both
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The most complete line of trampolins in the world, all with the superior safety, durability and performance of Gym Master's exclusive construction features.

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Model	Performing Area	Frame Size	Folded Size
Jumbo	7' x 14'	10' x 17' x 38"	10' x 1' x 6' 3"
Varsity	6' x 12'	9' x 15' x 36"	9' x 1' x 5' 11"
Titan	8' x 16'	11' x 19' x 39"	11' x 1' x 6' 10"
Colossus	10' x 20'	13' x 24' x 40"	13' x 1' x 8'
Champion	4' x 8'	7' x 11' x 30"	7' x 1' x 4' 8"
Professional	5' x 10'	8' x 13' x 33"	8' x 1' x 5' 2"

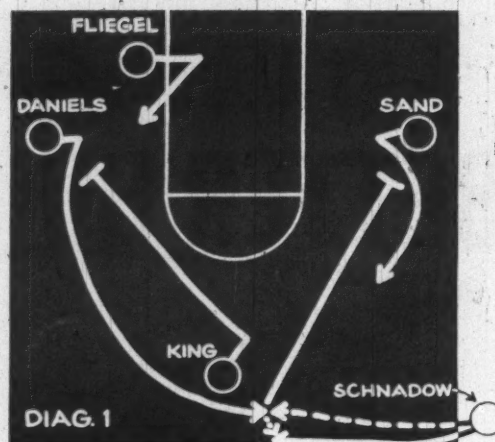
height measurement
on roller stands

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By **BOBBY SAND**, City College of New York

Special Rotation Freeze Patterns



IT WAS the closing minutes of the ball game—City College versus La Salle University—with City leading by seven points and in possession of the ball. At a signal from Coach Nat Holman, floor captain Bernie Fliegel called for a time out. Coach Holman turned to the bench and beckoned Izzy Schnadow, Izzy King, Lou Daniels, and this writer to enter the game as a substitute unit, leaving only big Bernie on the floor to serve as a pivot man for the new quartet. Of the group reporting to the scorer, no player was taller than 5-10—and no La Salle player was under 6 feet.

Schnadow took the ball out of bounds; King began to maneuver his opponent near mid-court in preparation for the throw-in; and Daniels and Sand took up positions in the respective corners. King and Daniels sliced on the far side of the court—freeing Daniels from his closely guarding opponent long enough to receive the in-bound pass from Schnadow.

Schnadow followed his pass into the court and came around Daniels to receive a soft over-the-shoulder flip. Daniels continued his movement toward the corner, screening Sand from his guard. The City College unit had moved into a four-man mill to freeze the ball (**Diag. 1**).

For the next few minutes, the ball never touched the floor—and the La Salle team never touched the ball. By means of their speed, dexterity, agility, and ability to handle the ball in close quarters, the "Busy-Izzies"—which soon became their identifying tag—froze the ball and put the game on ice. The game ended with City College retaining the ball and maintaining the seven-point lead.

Freezing the ball during the last,

vital moments of a game is an essential team technique. Some coaches feel that the patterns which were good enough to gain a lead should be good enough to protect it. And they can point to games apparently won going into the final moments that ended in defeat when the leading team switched to a freeze—losing momentum, losing possession, and finally losing the game.

However, this reasoning doesn't take fully into account the increased pressure which the trailing team would apply in any case and the weakness of the leading team in resisting this additional pressure. Freezing must be considered an important tactic in countering the pressure of a last-ditch pressing defense.

Even in leagues which place a 24- or 30-second limitation on continual possession, a modified type of freeze comes in handy. Teams with a lead of a few points will try to retain possession as long as possible before taking their shots. In many instances they'll go 20 seconds and then try to drive in to draw the foul if possible. Thus a team will have an offensive pattern or special

tactics for the closing moments which approximate the tactics of a freeze.

In organizing the freeze, one of the most important things to keep in mind is the match-up of players. For example, take the games between the Syracuse Nats and the Minneapolis Lakers of the Pollard-Mikan era.

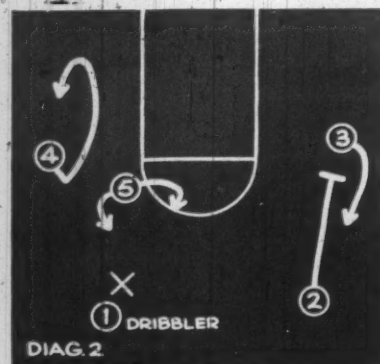
Whenever Syracuse was in the lead in the closing moments, the Nat being guarded by Pollard never came to the ball. Pollard was so quick and catlike, he could steal or tie up the ball with his speed and quick hands.

On the other hand, Mikan was almost stationary on defense. Therefore the ball would be given to his man, someone like Schayes or Lloyd who could dribble the clock away on the outside. It's thus essential for the offensive to know the defensive characteristics of their opponents and plan their tactics accordingly.

Secondly, the offensive team may use a topnotch dribbler to key advantage in a freeze. By spreading their players judiciously in the offense area, keeping the defense on the move away from the ball, and giving the dribbler ample room for a one-on-one situation between the foul and mid-court lines, the offense can utilize an effective dribbler to kill the clock (**Diag. 2**).

Where the team doesn't have a great dribbler for clock-killing purposes, they'll have to depend upon good ball-handling, speed, and agility to freeze the ball. Most often the freeze pattern may be based on a 4-man mill around a pivotman stationed in a high post on or around the foul line.

Players will scissor-screen in the corners to uncover an offensive



Molded Rubber Blocking Dummies

WITH REPLACEABLE COVERS



U. S. Patent No. 2904337

MIDGET SIZE

Not a stand up dummy.

Ideal for blocking and tackling drills, especially for trap and linebacker blocking drills.

Total weight 13 lbs.
Height 40 inches
Diameter of base 12 inches
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Lightweight — No need to drag to and from field.

Cover Zips On and Off for—Repairs, Cleaning or Replacing.

Plastic handles suspended on webbing, holder can release the dummy with ease. No sprained wrists and thumbs for holder.

***molded core will give
years of service
making it more economical
than conventional dummies
over the years.***

REGULAR SIZE

Stand up dummy with weighted bottom.

Ideal for blocking and tackling drills, especially for down field blocking.

Total weight 27 lbs.
Height 46 inches
Diameter of base 16 inches
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Knuckle skinner pad—prevents skinned knuckles.

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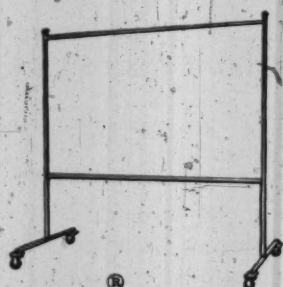
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PORTA-WELD MAT RACK. All-welded galvanized construction. Unit rolls on heavy rubber composition casters. Height 6' 2", length 93". (GREEN TOP) Adjustable sliding hooks are above eye level. Rack will take 12' mats.



PORTA-WELD UNIFORM RACK. All-welded construction. Main frame is of 1 1/2" galvanized pipe, upper and lower bars 3". Rack stands 6' high by 6' in length. Distance between upper and lower bars is 4'. Unit rolls on heavy rubber composition casters.



ALUMINUM GYM VOLLEY-BALL STAND. Regulation height for volleyball, badminton and tennis. All-aluminum with cast base fitted into two non-removable screw hooks, assuring non-slip rigid standards.

INDOOR TENNIS NET POSTS.

Heavy aluminum base fastens to floor plates. Heavy duty winch. Cast aluminum top with 3" wheel for net draw cord.

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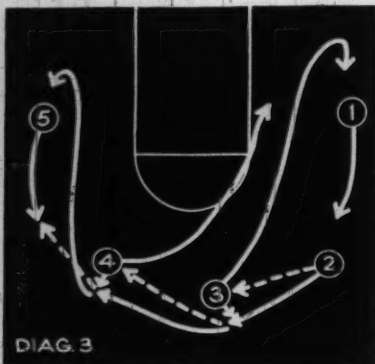
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player; use individual feints, change-of-pace, and other tactics to keep their guards off-balance; and use inside or outside screening during exchanges to protect the ball in the backcourt.

In preparing a team for its ball-handling skills, we begin the freshmen with a 5-man mill (**Diag. 3**).



When five defensive players are added, the drill takes on many virtues. It develops skill in handling the ball on the run and in close quarters. Offense players learn to space themselves properly, keeping from 15 to 20 feet apart instead of bunching together on the court. They gradually add individual feints and moves to keep the defense alert for the unexpected cut toward the basket.

The players learn to pass and to follow their passes, instead of standing still and watching the ball after it has left their hands, with a movement toward the ball and change-of-direction movements toward the basket. All five players on offense learn three cardinal principles—to know where the ball is; to know where and how the defense player is guarding; and to know where the offense teammates are and to move in conjunction with them.

And on the defense, they learn to slide through a potential trap; to play a man on the move in relation to the ball; and to become versed in the intricacies of team man-to-man defense.

Later we add a second drill in which each player moves to the ball, makes his pass to a teammate, and then cuts away from the ball to the opposite corner (**Diag. 4**). This serves as a countermove to a two-on-two switching and pressing defense. It also permits screening in the deep corners close to the basket on the side away from the ball.

This maneuver permits an effective thrust against a relaxing defense on the weak side and an

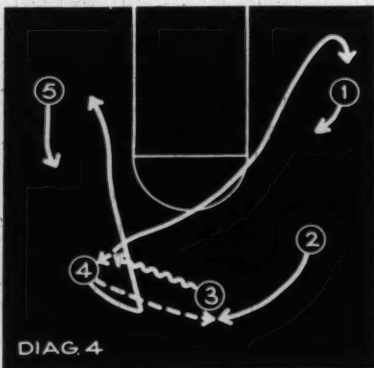
exploitable passing lane in the open middle court.

Once all players are acquainted with the various patterns of movement on the horseshoe, we move the big man to the post and drill on a four-man weave, interchanging big men and corner men until all know the different aspects and demands which may be made of them on the offense.

Later in the preparation period prior to the opening of the season, we return to the freeze and teach it in relation to the press. As we teach the pressing defense, we also go into the various techniques for breaking up the press and the means of protecting the ball.

Beginning with out-of-bounds plays against the press—as the ball would be put into play in a game—we move into simulated game situations. In re-creating a game atmosphere, we utilize the clock, officials, and the sound effects of the vocalisms by the rest of the squad, invited onlookers, and the like.

In a typical situation, the Blue team would be given a 3-point lead and two minutes to go in the game. Blue has the ball out-of-bounds underneath their own defensive basket, and the Red team is in a press. If the Blue team succeeds in holding the ball or maintaining their margin over the set time, they keep the ball for another simulated situation. If the Red team is successful, they take the ball for the next situation.



Afterwards we analyze the strategy and the tactics with the players, reviewing the various deeds and failures and the why-and-wherefores. These simulated game situations covering almost every conceivable phase of freezing and the press provide interesting fillips to the players and are wonderful conditioners as well as developing competitive "game-mindedness."

Things to Guard Against in the
(Continued on page 43)

**A GOAL
FOR ALL
FROM
THE COACH
OF THE
YEAR**

● Whether plunging through a line, “hitting” the books or merely engaging in social activity, you can’t be a “winner” without observing proper health habits. And health habit No. 1 on every list is—*don’t drink alcohol*. The deleterious effects of alcohol on the brain and coordinations preclude any possibility of top performance. That’s why “No Alcohol Drinking” is a “must” rule in every coach’s training and conditioning creed.

This vitally important message is dramatically presented in the handsome poster on the next two pages. Delivered by Paul Dietzel, the inspirational coach of the L. S. U. national football champions, these golden words merit conspicuous display on every school bulletin board.

The poster may be easily removed for display by merely turning back the staples with a knife or letter opener. For additional copies of the poster, check the “Alcohol Education” listing in the Master Coupon on page 63.

ALCOHOL EDUCATION

IN THE POSTER ON THE FOLLOWING PAGES

You Have to Live Right to Play Right



“Good training habits are just as important as good skills in building a winning team. Athletes have to live right to play right. And Rule No. 1 on the training list is don't drink alcohol. You can't put this poison into your system and expect to think quickly and act quickly.

Alcohol ruins the coordination be-

16



tween mind and muscle, spoils that delicate timing and sense of judgment needed for top performance. So never be tempted into thinking it's smart or sociable to drink. It's just plain silly to put anything into your body that harms it. That's why I say: Stay away from all forms of alcohol."



Ray Dwyer

A Message from Paul Bryant
Football Coach,
Leslie R. Smith University

"MAN OF THE YEAR, 1960"

ALCOHOL EDUCATION

1730 Chicago Ave., Evanston, Ill.

Questions and Answers on ALCOHOL

Is Alcohol a Stimulant?

NO. It is a narcotic, and as such it suppresses or lessens the activity of living matter. By lessening the caution it gives a temporary sense of well-being. But over a period of time it acts as a depressant to both mind and body.

Does Alcohol Increase Endurance?

NO. Alcohol saps energy and greatly increases fatigue. The reason for this is that alcohol slows down the removal of lactic acid (the acid formed by sugar in the body every time we exercise) and unless this acid is quickly removed the muscles soon tire.

Is Alcohol Good for Nerves?

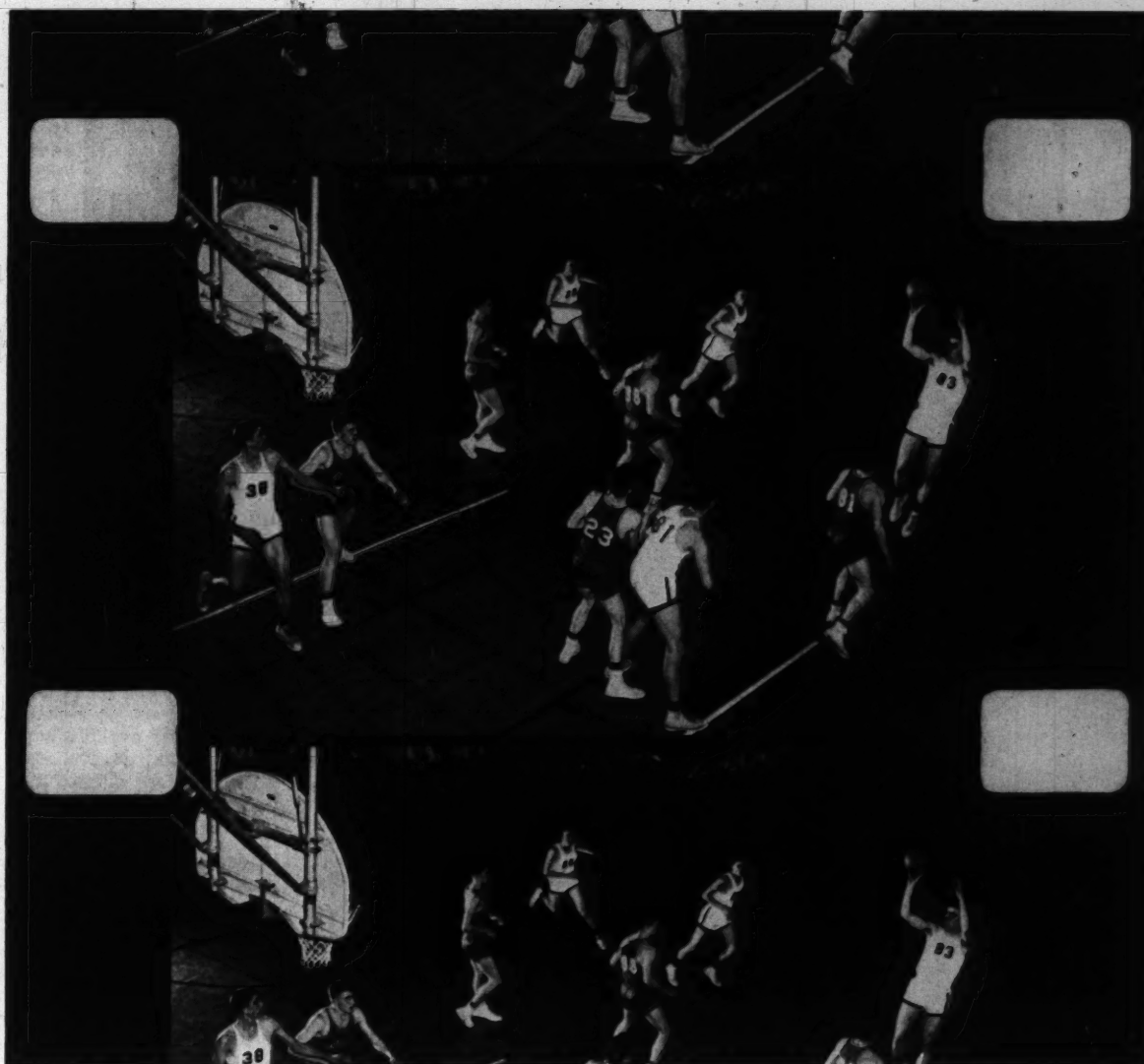
NO. Alcohol seriously upsets the nervous system. It disturbs the protective lipoids and dehydrates some of the moisture in the body which is so essential to proper functioning of the nerves.

Does Alcohol Improve Judgment?

NO. One of the most serious effects of alcohol is on the cortex of the large brain, or cerebrum, which directs our thoughts and actions. It interferes with the "messages" which are received from the sensory nerves and also reduces normal "inhibition" or caution.

Does Alcohol Aid Coordination?

NO. It interferes with both voluntary and reflex movements of the body, and completely upsets that "teamwork" between mind and muscle called coordination.



**You may know what's wrong
but you need a film to show your team**

No team is perfect. The winning team is the one that makes fewer mistakes. To reduce your team's errors a movie record of their games is one of the most helpful tools there is.

A film never forgets, misses nothing, spares no one. It is living proof for your players of the way they play.

DuPont has two 16-mm films that are ideally suited for sports movies—Types 930 (for daytime) and 931 (for indoor and poor weather shooting). They are high-speed, wide-latitude films, which means that you can count on good results even in poor light and when the exposure is not exactly right. And they can be processed extra fast. There is a processor near you to provide this service.

Write for a free showing of the 15-minute, 16-mm sound

movie, "The Assistant Coach", which shows how you can take your own movies of games—not only basketball, but football, swimming, track, baseball and many other sports.

E. I. du Pont de Nemours & Co. (Inc.)
2432-A Nemours Building, Wilmington 98, Delaware

SC-11

- ☐ Send movie, "The Assistant Coach". I will return it within ten days from receipt.
☐ Send full data on Types 930 and 931 Films. Also send list of processors in this area who can give extra-fast service with these films.

Name _____ Title _____
School _____
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Better Things for Better Living . . . through Chemistry



Basketball in Russia

BASKETBALL enjoys great popularity among the young people of the Soviet Union. It's played in the small Estonian town of Elva and in Norilsk beyond the Arctic Circle, in distant Magadan and the little Moldavian town of Chadyr-Lunga, where one of the smallest nationalities of the Soviet Union, the Gagauses, live.

The game is organized on a national scale according to age brackets: boys and girls aged 14-16, young men and women of 17-18, and adults above 18. Sometimes contests are held for children 12-13 years of age.

About a million people participate in basketball. They're trained both by paid coaches and volunteers who pass a special preparatory course. The best teams participate in both local (Union Republics) and national championships.

The annual tournament of picked school teams in the 15 Union Republics is a big event in our sporting life. This contest begins in the cities and culminates in the republic's championship.

Each republic then forms a team from the best performers at its championship meet, and these teams participate in the annual school championship of the entire Soviet Union. Several thousand teams participate in the first stage of this contest.

Large tournaments for adolescents are also conducted in the Labour Reserves system, which embraces the students of technical schools. They're conducted in the same manner as for the school teams.

In many cities, special youth sports schools have been set up to improve the skills of the most capable young players. Such basketball schools have been opened in 400 cities.

Contests are also held between specialized secondary schools (junior colleges). But these meets are confined to the republics.

Basketball is very popular among school children and students. For instance, nearly 200 teams participate annually in the contests at Moscow University alone; and the sport has

been included in the compulsory training program of schools and colleges.

The strongest teams in the country vie for championship honours in A and B leagues. Twelve men's and 12 women's teams take part in the country's championship (for the A League teams only). The victors are awarded the USSR title.

This is a round-robin contest. The two tailenders are dropped from the A League and replaced by the two top teams of the B League. Usually this is a keen, interesting struggle scintillating with all kinds of surprises. Thus, for instance, the holder of the 1958 and 1959 European Cup, the Riga army team, wound up in eighth place in the 1959 national competitions.

The B League consists of the winners in the championships of the Union Republics, Moscow and Leningrad.

The Soviet teams compete and train all year round. Quite naturally there are hiatuses for the school and college teams during examination time.

The game is played both indoors and outdoors. There are no rules as to the exact number of games that can be played during the season, or limitations on traveling distance.

By **VICTOR GRIGORIEV**, Head Coach, USSR Basketball Federation
and **STEPAN SPENDORYAN**, Head Coach, USSR All-Star Team

Adapted by Harris Buxenbaum, Coach, Walden School (N. Y.)

Actually, the school teams average 50 games a year (winter and summer). In the preliminary events, the teams are grouped territorially to avoid more than a day's travel.

Our teams have experienced coaches, usually former players who've finished physical culture institutes or trainers' (coaches') schools. Basketball coaches are trained by 15 physical culture institutes, 12 specialized secondary schools, 7 trainers' schools, and nearly 50 departments of physical training at teachers' schools.

The coaches of the leading teams and the physical training instructors at colleges and schools receive pay for their work. But the large group of mentors who coach the teams at their place of work—at plants, offices, educational institutions, and military units—do so on a voluntary basis, free of charge. They get their training for this kind of work at special courses.

The title of Honoured Trainer of the USSR has been established to encourage coaches to produce material for the national team.

Qualified officiating is of great importance for the development of the game and we now have 26,000 referees in the country. They don't get paid for the job of refereeing itself, but all of their travelling expenses, food, etc., are footed by the organization conducting the meet.

Basketball is part of the physical training curriculum at regular schools, specialized secondary schools, and colleges. In fact the basis of the physical training program at a number of schools isn't gymnastics, as it used to be, but basketball and athletics!

COACHING EMPHASIS

When teams are formed, players with the best physical build and skill are selected. The nature of the candidates and their will are also taken into account. We coaches believe it's most important to build up a monolithic group founded on friendship and comradesly spirit.

As a rule, workouts are held for two hours at least three times a week. Upper class teams practice more—five times a week. They also train in other sports—track, football, volleyball, hockey, skiing, skating, gymnastics, swimming, rowing, etc. This provides the players with all-round development. Practice stops only during vacation (both for workers and students).

The best results are being obtained by teams fielding the tallest men. The average height of our players is gradually rising from year to year.

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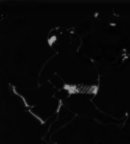
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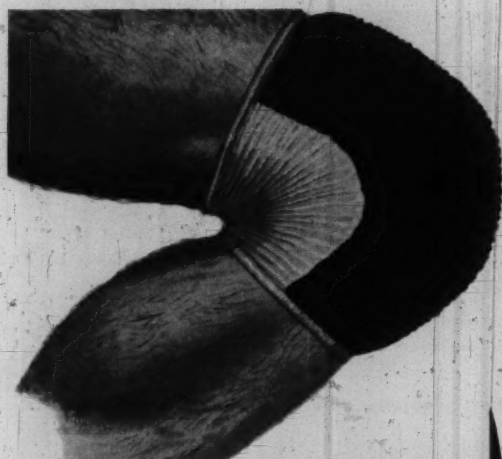
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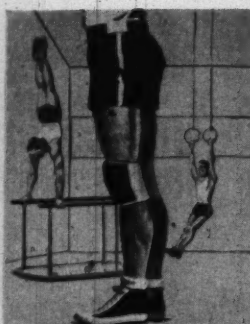
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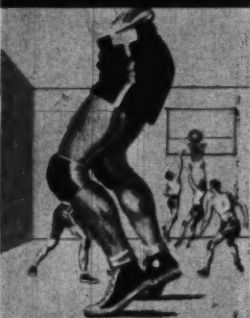
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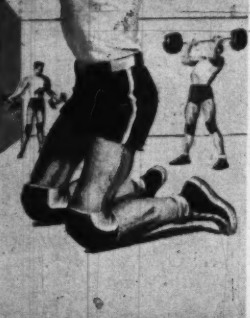
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The national team serves as a good example. Whereas in the 1952 Olympic Games, our tallest man stood 6-4 in his stockinged feet, and the smallest 5-8, at present the team's highest chap is 7-2 and the smallest 5-11.

There are four fellows in the USSR line-up with heights between 5-11 and 6-3, five more between 6-3 and 6-8, and still another five over 6-8.

Athletes of all 15 Union republics participated in this year's Tournament of Nations of the USSR, and each team rostered players exceeding 6-8.

Since we have so many youngsters now playing the game, the mastery of technique assumes particular significance. At least half of our practice time is devoted to the study and improvement of fundamentals.

The experiences of the USSR team, representing the country's best players, are popularized through instructional aids, films, and the press. The most important questions on the game are also discussed in the sporting columns of our newspapers.

Much importance is attached to passing with one and two hands. Chief attention is given to short-passing practice because long passes can be intercepted. One of the chief requirements is to be able to dribble without looking at the ball and to block an opponent from the ball with your body.

Shooting is practiced thoroughly, especially one-hand jump shots from the top of the lane. From farther out, the players usually shoot with two hands. We also practice a good deal on tapping in missed shots.

Before drawing up a game plan, coaches study their future rivals, scout their games, and then brief their own players at a team meeting.

Practically all our teams employ the man-to-man defense. This means close guarding and a keen fight to gain possession of the ball. At the same time, the defense does everything it legally can to prevent the opponents from taking a shot or passing.

Some teams use the zone or a combination defense, but the man-to-man defense remains universal.

In studying rival teams, chief attention is paid to the build, height, stamina, and speed of the players. Their technique, experience, and, finally, their tactical skill are also taken into consideration.

Swift cutting attacks have become widespread. If the cut fails, the players switch over to passing to one or two pivot men, with a good deal of screening tactics being used. But if

the defense is bunched and it's hard to work the ball into the pivot, then the team feeds the ball to one of the players for a medium-distance attempt at the basket.

The attacking scheme and tactics largely depend on the defense encountered. Against the zone, the system of attack is based on combinations where players take up specific spots on the court. Against close guarding all over the court (press), the attacking side uses special combinations with plenty of screening.

In principle we're striving to arm our teams with several systems of defense and offense.

A very interesting problem is the development of personal initiative or, as it's customary to say in our country, "the players' tactical thinking." Unfortunately we cannot as yet claim great achievements in this sphere, but many coaches have done a lot of work in it.

Among the methods employed are the so-called "sportsmen's individual assignments." A player gets the assignment of learning or improving a technical skill independently, outside of regular training sessions, and some time later the coach checks on the fulfillment of this assignment.

The players are assigned to independently observe and analyze the play of their future opponents and to draw up their own plan of action against them. These methods help develop the player's initiative.

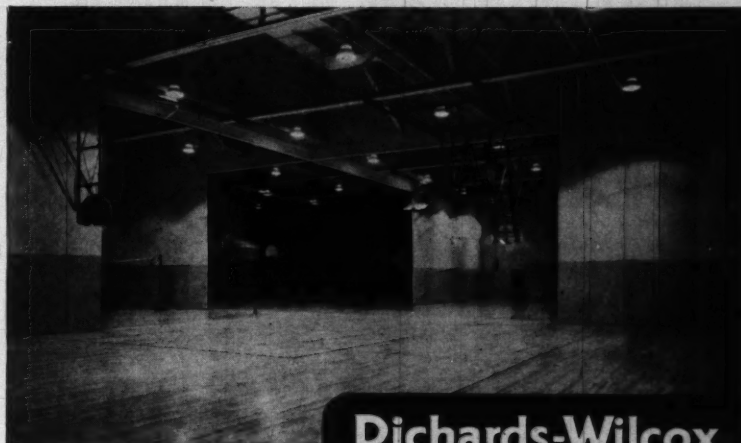
Buddy System

(Continued from page 22)

shooter's energy and helps keep his thoughts centered on the actual techniques of making the shots, instead of momentarily distracting his attention away from those movements.

We've always preferred to have another player, rather than an assistant manager, retrieve the ball. We believe that the most important fundamental of basketball is ball-handling and that our players cannot get enough practice in it since every additional bit makes for improvement.

We stress with the retriever the importance of getting up in the air as high as possible on all missed shots and making either a follow-up shot or a quick, accurate passout (while at the height of his leap) back to the shooter on the line. This gives all the squad members extra practice in rebounding, strengthens their legs, and sharpens their timing in the vital "getting the ball out from under."



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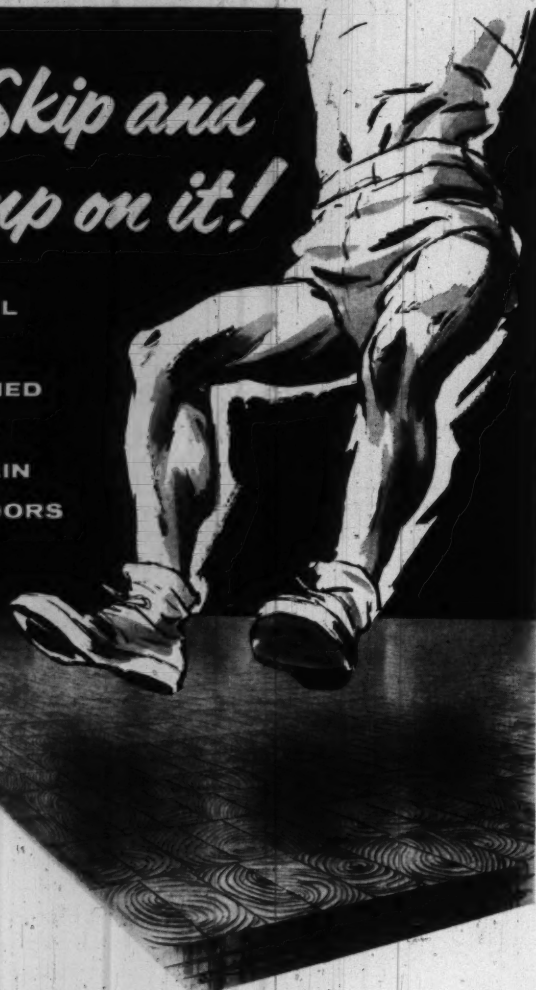
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2. Someone to watch for incorrect procedures in the shooter's form. Of course the coach and his assistant also point out any errors as they move from basket to basket.

The correct procedures are explained and emphasized to both players. Both then watch for these elements, attempting to eliminate the incorrect ones and "groove" those which are correct. This is a definite advantage in that it enables the players to immediately rectify any mistakes rather than have them develop wrong habits.

The retriever is cautioned specifically to watch for these malpractices and correct them as they happen. This provides an individual instructor for every member of the squad in addition to the coach himself, and minimizes mistakes since an error is immediately drawn to the attention of the shooter. He can thus concentrate on eradicating incorrect movements as quickly as possible.

3. Someone for immediate, on-the-spot competition. The two players shooting at the same basket provides for a little spur-of-the-moment game. Since they shoot a series of five successful attempts, with the shooter on the line continually changing for variety and renewed interest, a player may miss more shots than his "buddy" in one series of five but has a chance to beat him out when they move on to the next basket for the next series.

4. Someone to help keep the shooter "honest" in his count. The fact that the boys are competing with each other discourages "chiseling," and even where there's no such intent, it's easier for two to be accurate.

5. More practice shots in less time because the retriever gets the ball back to the shooter much faster.

6. Probably the biggest advantage of the Buddy System is that it makes each player concentrate more thoroughly and continuously on the techniques taught by the coach.

They *must think*, for in order to criticize his Buddy's form, a player first must know what is correct and, second, conscientiously think about what is right and what is wrong with the shooter's movements and methods.

This makes him more alert and really thinking about what he himself does when he steps up to that line. Without such thinking, there can be no improvement!

How many times have YOU yourself thought (even if you didn't admit it aloud), "I never really did learn *how* this game *should* be played until I started trying to tell others how to do it!"

Zone Defense

(Continued from page 16)

ADVANTAGES OF A ZONE

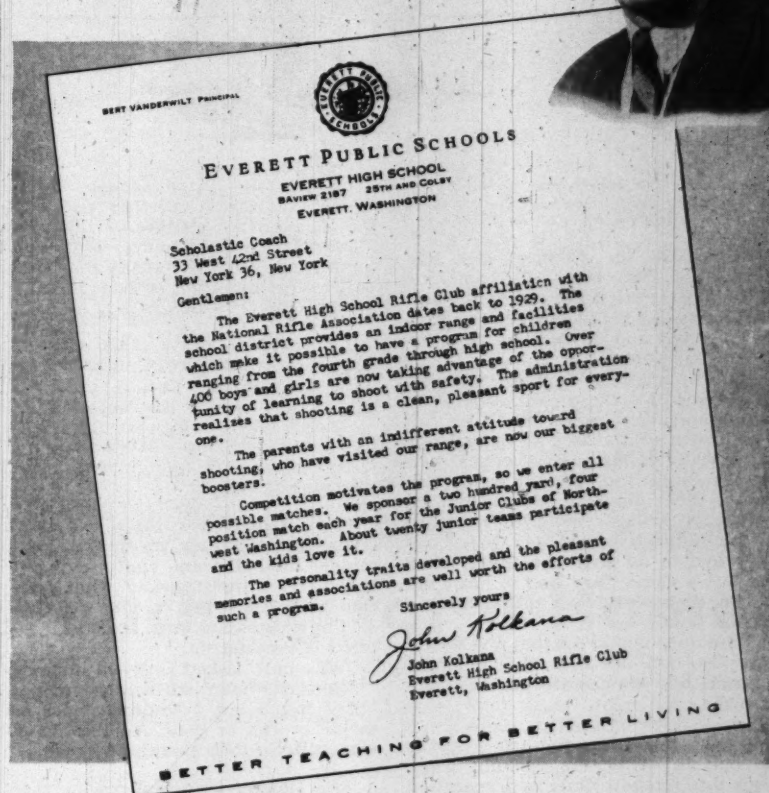
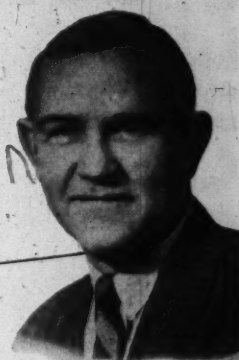
1. Stops most weaving, screening and driving teams, or at least makes them less effective.
2. Always has your rebounders in position.
3. Excellent for fast break patterns.
4. Very good for stopping a single pivot attack and play around the key.
5. Keeps your players from fouling out, as there's less chance of fouling than in the man-to-man defense.
6. Helps to cover up for one or two poor defensive men.
7. Develops aggressive ball players, ball hawks.
8. Forces opponents to shoot from the outside and from difficult angles.
9. Slows down an offensive-minded team.
10. Easier defense to teach than the man to man.
11. Develops teamwork on defense, as the players have to cover special lanes and areas.
12. Protects your stars from fouling out. (At La Salle, Tom Gola was protected by the 1-3-1 zone.)
13. Good as a surprise and up-setting maneuver.
14. Excellent to stop a star on opposing team (box and one).
15. Excellent to use in tournament play where players are usually tense and nervous.
16. Very effective on a narrow court.
17. Better suited for tall and rather awkward players.

DISADVANTAGES OF ZONE

1. Vulnerable to good passing and shooting.
2. Gives shooter lots of time to get set.
3. Develops a lack of individual responsibility (no special man-for-man assignment).
4. Leaves many scoring areas unguarded, e.g. sides, middle, foul line, underneath.
5. Difficult to cover all areas on a large court.
6. Weak against good outside shooting.
7. Useless when you're trailing, as team can hold ball.
8. Your chasers may foul more as they have to hustle to cover a large area.
9. Game becomes a shooting match and lacks movement.
10. Game lacks crowd appeal.

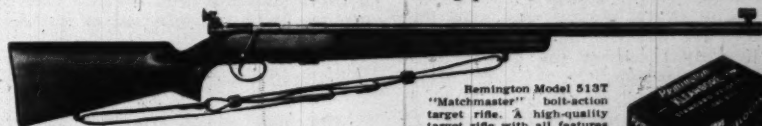
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Writes **JOHN KOLKANA**
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COACHES' CORNER



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PROBABLY the funniest guy this side of Bob Hope, Cactus Jack Curtice is a raconteur without peer. His Tennessee Ernie delivery conceals a rapier wit and devastating sense of humor. Sample:

"Lots of people ask me how I stayed in coachin' all these years—bein' so stupid and all, I mean. Well, I'll tell you. Down in Texas one year, I got the biggest, tallest, and strongest two boys I could find. Then I gave each one of them the kind of scholarships you get at colleges down in Texas but not at Stanford—and I told these boys they had to do only one thing, after we lost a game, they had to hoist me up on their shoulders and carry me off the field.

"The folks would see that and they'd say, 'Oh, hell, ole Jack ain't much of a coach, but you can see the kids love him.'"

Woody Hayes has done as much as anyone to bring the rushing game back into football. Only in desperation will his club pass the ball more than six or seven times. So when Woody, in a fit of pique, chased Big Ten Commissioner Tug Wilson and a group of sportswriters out of Ohio State's training camp at the beginning of the 1958 season, Notre Dame coach Terry Brennan wryly quipped:

"You think Woody was mad that day? He was madder the next day. He caught one of his quarterbacks throwing a pass."

Our favorite nephew, Pete, aged 13, was recently taken to his first horse race. Before the meeting got underway, his daddy told him that he was going to place a two-dollar bet for him. He rattled off the names of the horses and Pete picked one. You guessed it. The horse came in and Daddy delivered the winnings to the awed kid.

"Well, Pete," said Dad, "would you like to place a bet on the second race?"

Pete waxed indignant. "Bet with my money," he snorted. "No sir."

Like the wry but trenchant way in which Al Davis, assistant coach at U.S.C., describes his idea of defensive pursuit: "To demoralize the ball-carrier, we want 11 men to reach the ball in the minimum amount of time, all arriving in a bad mood."

Johnny Shives has a sharp sense of humor for an umpire. One of his reports to Carolina League president Bill Jessup carried this notation:

"Please take \$5 of pitcher Red Willis's money. If you can find an old resin bag, send it to him to practice throwing in the air."

Duffy Daugherty's little son came home one day after trying out for a midget football team. Duffy, evincing a fatherly interest, asked what position he was playing.

"I'm not playing any position," replied the youngster.

"Why not?" asked Duffy in surprise. "Because," replied the youngster, "they found out I couldn't block or tackle or run or pass. All I could do was yell. So they made me coach."

After observing his first rowing race, the football coach remarked: "That's for me. It's the only sport I ever saw where you can sit on your fanny and win going backward."

In his last year at Indiana, Bernie Crimmins was approached by a sympathetic alumnus who asked: "Coach, are we being out-offended or out-defensed?"

"Neither," snapped Bernie. "Out-recruited."

The high school principal warned the recently hired football coach not to reveal the financial terms of his contract.

"You can count on me," replied the coach. "I'm just as ashamed of it as you are."

Tired of being the conference doormat, the college president decided to lend a hand in the recruiting. He toured a number of school gridirons and then returned and called in his coach.

"How did you make out?" asked the mentor.

"Well, I saw one team that went through a 12-game schedule unbeaten, untied and unscored-on. The amazing thing about it is that their line averaged just 145 pounds, their backfield 135, and they had no passer or kicker."

"Well," said the coach. "You didn't waste any scholarships on them?"

"No," replied the president, "but I hired their coach as your successor."

After the Detroit Lions finished the 1958 season, a sportswriter cornered Jim David, the doughty little defensive back, in the locker room.

"Would you say you had a good season?" the scribe asked.

"Any time you come out of a pro season alive, you've had a good year," grinned the little fellow.

One day the Baltimore Colt coach, Weeb Ewbank, asked "Big Daddy" Lipscomb how come he was such a marvelous tackler.

"Coach," grunted the behemoth tackle, "I just wrap my arms around the whole backfield and peel 'em off one by one until I get to the ball-carrier. Him I keep."

The Bears and 49'ers were having one of their typical Pier 6 brawls, when Joe "The Jet" Perry took the ball, put his head down, tore through a big hole, and rammed head-first into the goal post.

The 49'er toughie bounced off the post, wobbled a bit, and flopped over for a touchdown. The 49'ers went into a huddle for the extra-point. But there was no Perry. Finally he staggered into the huddle. He blinked a few times, shook his head, and looked at his teammates.

"You, Bob (St. Clair), you got your man. But which one of you so-and-sos missed the block on that line-backer?"

Duffy Daugherty, Michigan State football coach: "They tell me some of our freshman look awfully good. But they're probably not ready for the varsity as yet. Remember, they haven't had the benefit of my coaching yet."

Earle Edwards, North Carolina State coach: "I made two suggestions to the rules committee, and neither was accepted. I asked that the goal line be moved nearer my team and that the fourth quarter be eliminated."

During the summer hiatus, the first-string Iowa State guard met one of the Oklahoma scrubs.

"I suppose you're looking forward to the season," said the Oklahoma player.

"I sure am," replied the Iowa State tackle, "But I certainly hate to think about our game with your team."

"What are you kicking about?" answered the Oklahoma scrub. "You only meet 'em once during the season. We play 'em every few days."

Freezing Patterns

(Continued from page 30)

Freeze: In setting up a freeze, there are several aspects of which a coach should make his players aware. First, too many teams use the weave indiscriminately. The players mill mechanically. They seldom pass to the pivot man and cut through to the basket. They scurry laterally, with no change-of-pace, no changes of direction, and seldom a feint to throw their guards off-balance.

It's not surprising to find the defense pressing, switching, and intercepting the ball as they anticipate the offensive moves. To be dangerous, the offensive team must be poised and alert to strike directly toward the basket; at any rate, the threat via feints must be demonstrated.

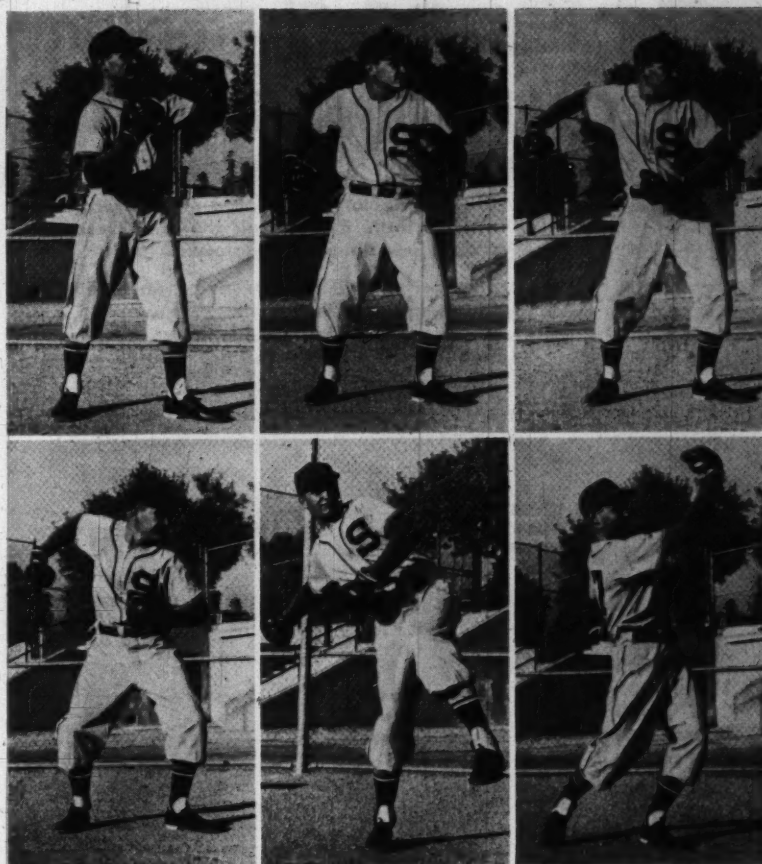
Second, when a one-man dribble is used to kill the clock, the offense must be ready for a two-man defensive pinch to tie up or steal the ball. Should the dribbler come too close to the sideline or to the mid-court line and the offense has failed to keep the defense busy or permitted their guards to be brought close to the dribbler, the defense may put the pinch on the dribbler.

The key man in such crises should be the pivot man. He should be the trouble-shooter; the man who's on the move in and around the foul-line area, facing the ball at all times and ready to move into receiving position for the intended pass. As he's in an open area, any body contact from the rear or side should be readily observed by the officials and the resulting foul posted.

The pivot man doesn't stand on a dime and wait for the ball to come to him. Although his back is to the basket, he may feint moves to left or right and keep in motion, awaiting a pass or clearing the ball away from a trouble spot, moving quickly into each pass. Should the offense fail to use the pivot man or should the pivot man be remiss in his duties, freezing the ball may become quite a difficult chore.

A third problem which the offense, especially those schooled in milling methods, may encounter is the defensive tactic of stepping into the path of a moving offensive player without the ball, permitting contact to be made, and then staggering back in dramatic fashion to earn a foul shot for an illegal screen or pick.

When running in the mill, the offense must be aware of these tactics and learn to sidestep and to avoid contact with on-rushing de-



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by Fred Farmer

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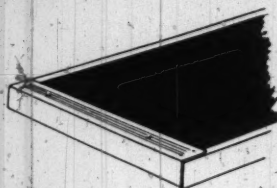
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fensive players seeking to disrupt the freeze by claiming fouls. Or the offense may stand their ground, after flipping the ball over-the-shoulder to a teammate, count to three, and then roll away from the play toward the basket.

In this manner, they prevent foul calls and set up give-and-go plays which will lead them directly underneath the basket for easy lay-up shots against a wide open rushing defense trying to get the ball at any cost.

A fourth situation which the offense must guard against in the freeze is the tendency of players to run with their backs to the ball or to lose sight of the whereabouts of the ball while trying to elude their guards. Against the pressing defense, all offensive players must know where the ball is and be ready to come to the aid of a beleaguered teammate fighting off a closely guarding opponent.

BUDDY UP AND SCREEN

Furthermore, they should learn to buddy up and screen for one another to help each other become free for a pass. Run with a purpose—don't move blindly and indiscriminately, and you'll be able to make many spontaneous moves to thwart an aggressive, pressing defense.

The fifth problem with which the offense must concern itself during a freeze is the time limit in advancing the ball toward the basket and the length of time a ball may be held by a closely guarded offensive player.

It's not sufficient to hold the ball out against a loosely guarding team or a team playing a compact zone inside the foul line toward the basket. Although the offense needn't heedlessly plunge into the scoring area against such a defense, under present rules the offense must move and thrust into the foul line area or be found guilty of a technical infraction after an official warning.

Similarly the defense must go out to guard against the offense or be found guilty of a technical infraction. Although the onus is on the defense to make a game, nevertheless the offense isn't fully excused from a complete sitdown stall. The offense must keep the ball in play and make the requisite moves within the various time limits or lose possession.

Lastly, going into the last minute of a close, exciting game, it's inexcusable for the leading team in possession of the ball to take a shot from beyond the foul line unless it's forced to do so by a time limit on possession. Too many times has the

tide of a game been turned by one poor long shot which gave a losing aggressive team a chance to get back in the game by regaining the ball.

The offense may well ask—"When do we go for a basket during the freeze?" If it's a layup all alone underneath, the rule can be—at all times. Any other type of shot must be weighed against the various factors—the amount of the lead, the amount of time remaining, and the like. Possession should be stressed against any type of shot except an easy layup, if leading by 3 or more points and less than 1½ minutes remaining.

Freezing the ball is a colorful part of basketball. When executed properly, it's exciting and crowd-pleasing as any "chase" can be. Although time limitations on continual possession are being introduced more generally, modified ball control and strategic execution of freeze tactics are still necessary phases of fine coaching.

Beginning with the offense against the press, a coach should delineate the significant aspects of freezing strategy. By simulating game conditions, a team can become "ready-alert" and poised for actual game situations.

Here Below

(Continued from page 5)

in America since the Russians became the world's second ranking power in the sport—it's all nicely explained in this issue by two of the USSR's foremost coaches.

Like many other Russian endeavors, it's pretty much patterned after the American game. There's nothing revolutionary about it. It's just an imitation of our game.

But organizationally wise . . . brother! Like everything else, basketball is organized on an extensive nation-wide basis. Thousands of coaches and officials are carefully trained, and youths everywhere—in schools, colleges and factories—are encouraged to go out for the sport. They are then given intensive courses by nationally appointed coaches.

The players are organized into leagues, with the winners playing off for the championship of their republic. The 15 republic champs then play off for the national title. From all these tournaments, the best players are plucked for the national team.

With this government-sponsored mass approach, Russia can't help developing superior teams.

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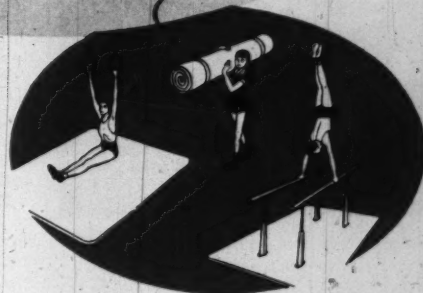
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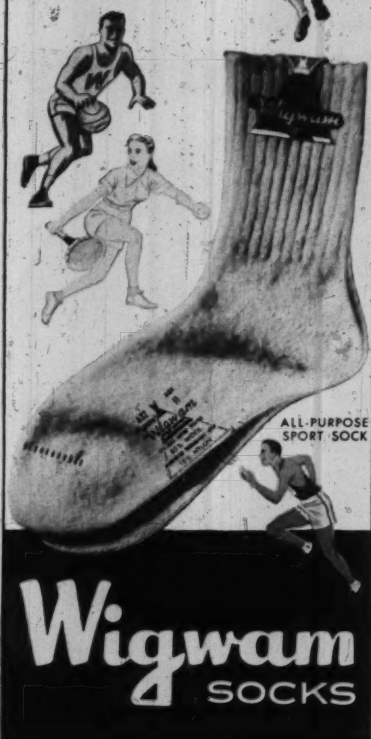
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New Books on the Sport Shelf

• **BASEBALL PLAY AND STRATEGY.** By Ethan Allen. Pp. 361. Illustrated—photos and diagrams. New York: The Ronald Press Co. \$5.50.

THE noblest Yale man since Frank Merriwell, Ethan Allen can do no wrong in our book. After all, hasn't he contributed 14 superb articles to *Scholastic Coach* since 1939?

A .300 hitter in his 13 years in the majors, a former National League Film Bureau Director and sports commentator, a college coach for 13 seasons, a baseball game inventor, and a four-time author, our man Ethan knows his way around all the bases, and he touches all of them in this magnificent book.

A comprehensive, thoroughly authoritative manual, this book covers everything in a way that every coach can easily understand and apply. The book is broken down into four big sections:

Part 1, Defensive Baseball, covers basic fundamentals, pitcher, catcher, factors determining positions, tactics for infielders, first baseman, double play combinations, second baseman, shortstop, third baseman, and outfielders.

Part 2, Offensive Baseball, elaborates on batting, bunting, base running, and sliding.

Part 3, Practice Techniques, expounds batting and fielding practice, and practice drills.

Part 4, Game Strategy, covers duties of base coaches, methods of giving signals, control of game situations, and analysis of a world series game.

A splendid appendix offers additional tips on methods of scoring and determining percentage records, diamond layouts, and practice aids.

You've never seen illustrations like the ones in this volume. Nearly 100 famous big league stars demonstrate all the basic techniques in both single action and sequence photos. All in all, the book contains about 500 sharp, graphic pictures plus many large, attractive diagrams.

Get this book immediately. We can't think of a better way of girding yourself for the next season.

• **DEFENSIVE BASKETBALL.** By Frank McGuire. Pp. 268. Illustrated—photos and diagrams. Englewood Cliffs, N. J.: Prentice-Hall, Inc.

WHEN the great North Carolina coach decided to put all his ideas into print, he made a wise decision. Instead of compounding all his thoughts into one book, and thus skimp on detail, he decided to write two books—one on offense and the other on defense.

His initial volume, *Offensive Basketball*, hit the stands last fall and it

was a beaut. Opus No. 2, *Defensive Basketball*, is now ready—and it's just as great a book.

Having known Frank for a great many years, we can endorse his theories unreservedly. A brilliant and painstaking mentor, he has coached on both the high school and college level and knows exactly what coaches are looking for.

What makes this book particularly great is that Frank is primarily a defensive coach. One of the nation's foremost exponents of the varied defense with "surprise" elements, he details the skills and techniques which have proven so effective throughout his brilliant career.

Compounded into eight big sections are all his theories on individual man-to-man defense, man-to-man team defense, zone defenses, game defensive situations, the press and its variations, and scouting, defensive strategy, and drills.

Somewhere in this sound, detailed, and comprehensive book, you'll find exactly what you're looking for—overshifting, sagging and floating, playing the big man, rebounding, stopping the fast break, all the zone defenses including the North Carolina point zone, point and one, screen switch, dog-and-box, and dog-and-diamond; playing the lane, jump ball and out-of-bounds plays, meeting the freeze, full-court press and variations, etc.

Illustrated copiously with pictures taken by *Scholastic Coach*, the book offers a thorough, hugely practical guide to defensive play. Every coach will find it the perfect answer to all their defensive problems and teaching.

• **BETTER BOXING (An illustrated Guide).** By Eddie LaFond and Julie Menendez. Pp. 118. Illustrated. New York: The Ronald Press Co. \$2.95.

COMBINING graphic text descriptions with many excellent action photos, the two famous collegiate boxing authorities offer a complete practical course of instruction from the first day of training until the athlete emerges as a finished boxer.

Every essential skill, technique, and coaching aid is described in three sections and an appendix.

Part 1 covers boxing for beginners, stressing: getting started, stance, footwork, the four basic blows, south-paw boxing, basic drills and combinations, corner boxing, training for a bout, and safety measures.

Part 2 covers advanced boxing techniques and general ring strategy, while Part 3 elaborates on tournaments, meets, and refereeing. An excellent appendix presents 25 lesson

plans based on the text and a glossary of boxing terms.

This is a wholly satisfying manual for both coach and boxer.

- **BASKETBALL—INDIVIDUAL OFFENSIVE.** By "Hot Rod" Hundley. Pp. 20. Illustrated. Delray Beach, Fla.: Gainsford Publishing. \$1 (plus 25¢ for handling).

UNANIMOUS All-American at West Virginia in 1957 and currently starring for the pro Minneapolis Lakers, the fabulous "Hot Rod" analyzes all the basic individual techniques in this 11" by 8½" book.

Covered clearly and tersely are the eight basic passes plus hints on receiving, dribbling technique, six fundamental shots, and eight ball-handling antics.

All the skills are illustrated by the famous author.

- **THE PREP BASKETBALL SCOREBOOK:** By John Toomasian. Pp. 72. School price, \$1.50.

SPECIFICALLY designed for high schools but applicable for colleges as well, this highly attractive and practical scorebook in the handiwork of a crack California coach (whose article on defending the star appears elsewhere in this issue).

The book, handsomely bound in red imitation leather with a white plastic binding, offers room for 30 complete games. The layout is quite novel: (1) Scoring area is boxed in, (2) fouls centrally located, (3) mechanical scoring procedure, (4) running score which permits recording of player who scored each point chronologically.

Supplements include: (1) Team Roster & Personal Statistics, (2) Field Goal & Free Throw Percentage Charts, (3) Individual Player performance sheets for each game, and (4) Final Game Results Sheet.

The book can be ordered from John Toomasian, 1237 W. Cambridge, Fresno, Calif.

- **HOW TO STAR IN FOOTBALL.** By Herman L. Masin. Pp. 64. Illustrated—photos and diagrams. New York: Teen-Age Book Club. 30¢.

TO MEET the need for a handy little book describing and illustrating all the basic fundamentals, *Scholastic Magazines' Teen-Age Book Club* called in the editor of *Scholastic Coach* and here's the end product—a beautiful 64-page job covering the fundamentals from A to Z.

How to Star in Football offers a crystal-clear, highly professional analysis of the ABC's of backfield play, quarterbacking, offensive line play, forward passing, kicking, team offense, and team defense.

Supplemented with many fine picture sequences of star players from Oklahoma, Princeton, and Columbia, the book is guaranteed to improve the techniques of every player on every level of competition.

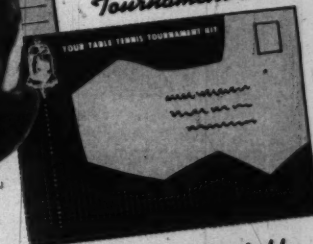
(Continued on page 59)

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What About Wheat Germ?

(Continued from page 26)



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teristic sign of a small pulse wave in the aorta or in the large arteries attached to the heart. In our experiments we've usually measured the pulse wave from the large brachial artery of the upper arm.

We note there was more blood flowing to the heart in the quiet standing position in subjects fed wheat germ cereal for several weeks, as the pulse pressure and pulse waves were relatively higher. In overcoming "splanchnic circulatory ptosis" (sag of blood), the wheat germ cereal and wheat germ crystals have both proved helpful.

In hard work we want as much blood flow (and oxygen intake) as possible. In the experiment with young boys, the best average performance in "All-Out" Treadmill Running Time has been achieved with supplements of wheat germ or its derivatives in the form of wheat germ oil.

In the two experiments on U. S. Naval personnel, it was shown that some real advantage was present for the groups or individuals on supplements compared to those on placebos. The advantage is greater with subjects undergoing hard work for several hours per day and it shows up relatively more in hard endurance events like the mile run, an endurance swim, the 5-minute Step Test, push-ups, squat-jumps and survival in the entire course than in short dynamometer strength, agility or highly skilled events.

The fact that advantages for the supplemented groups have usually developed during a course of training, 6 weeks or more in length, in long continued events which last several minutes and include large groups of big muscles, suggests that such feedings would help athletes.

RELIABILITY OF THE EXPERIMENTS

In the 600-yard run test, the reliability coefficient was 0.807. The gains are of practical importance. In the 600-yard run a second is equal to about 4 yards with these boys. The WGO Crystals Group was better than the placebo group by a total of approximately 83 feet, or 35 feet average per year, or 2.29 ft. average per boy per year.

The Fisher's t for the differences between WGO and Placeboes (for the all-out treadmill run which was motivated as opposed to the 600 yard run which was unmotivated) is 2.35 (1957-1958 data). This is significant at the 5 per cent level of confidence. For the Crystals of WGO vs. Placeboes, $t = 1.36$ and for Wheat Germ Cereal vs. Placeboes, $t = 1.52$.

1. No final conclusions are made, nor are they justified, until more experiments like these are conducted. It's important to determine consistency of several experiments like this

one, done if possible at several different research stations.

2. Four years of experimentation at the U. of Illinois in the Sports-Fitness School show reasonable consistence of results, except that in one year, namely 1957, when *Wheat Germ Cereal* produced relatively better results on the all-out treadmill run than the other dietary supplements of Wheat Germ, Crystals of Wheat Germ and Cottonseed Oil.

3. In the year 1957, the differences between the four groups are not statistically significant but the trends are thought to be helpful:

Wheat Germ Group (Reds) ... improved an average of 3.25 S. S. (standard scores).

Wheat Germ Oil Crystals (Blues) ... improved an average of 2.04 S. S.

Wheat Germ Oil Group (Whites)

... improved an average of 1.30 S. S.

Cottonseed Oil Placeboes (Greens)

... improved an average of 0.49 S. S.

4. Cardiovascular improvement in Component I (Autonomic Nervous Tone) is reflected in terms of the Amplitude of the Brachial Pulse Wave (sphygmogram) in the improvement of the Schneider Index and also in the Area of the Brachial Pulse Wave. The Brachial Pulse Wave Amplitude was affected relatively most by Placeboes (12.60 S.S.); and the Area of the Brachial Pulse Wave was affected most by Wheat Germ Oil (21.62 S.S.). These differences are significant at the 5 per cent level of statistical significance compared to the effect of the Placeboes of Cottonseed Oil. The Schneider Index was also affected relatively most by the Wheat Germ Cereal (0.33 S.S.) compared to Placeboes of (-7.67 S.S.), Crystals of WGO (-8.08 S.S.) and by Wheat Germ Oil (0 S.S.). This test indicates that fatigue was resisted better by those who took the Wheat Germ Cereal and the Wheat Germ Oil.

5. Another type of cardiovascular condition, namely Splanchnic Tone, Component II, was affected relatively most by Wheat Germ Cereal on the Change in Pulse Rate from Lying to Standing Test (7.07 S.S.) whereas all other groups lost or showed only small gains in fitness in face of the fatigue work: Placeboes 1.93 S.S.; Crystals of Wheat Germ Oil -7.38 S.S. and WGO -21.76 S.S. On the Change in Blood Pressure (Pulse Pressure) test from lying to standing, the Crystals of Wheat Germ Oil Group improved the most (6.00 S.S.), whereas the other groups lost in fitness: WGO Group -4.07 S.S., the Wheat Germ Cereal Group -1.92 S.S. and the Placebo Group -8.47 S.S.

6. The All-Out Treadmill Run was affected most by the Wheat Germ Cereal Group (7.13 S.S.), and then in order, Placeboes (4.53 S.S.), WGO Group (3.85 S.S.) and Crystals of Wheat Germ Oil Group (2.54 S.S.).



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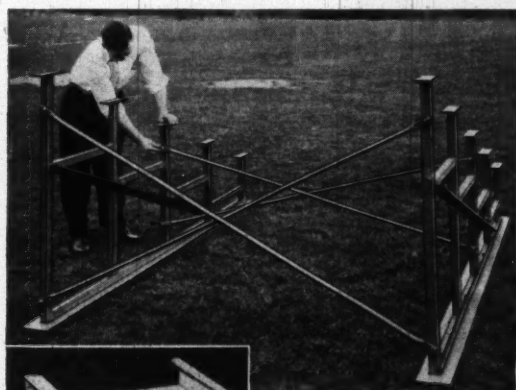
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*Salcolan was one of the medications used to treat injured athletes in the 1959 Pan American Games in Chicago, Ill.



(ABOVE) Assembly of steel structure is completed by attaching cross braces to frames with wing nuts.

(LEFT) Optional slide plank bolters for frequently disassembled bleachers.

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ILLUST. B: At top, head is in the natural position, eyes looking straight ahead, the arch high in the chest, with abdomen flat. Bottom picture shows line up on the entry.

ILLUST. C: Entry position, shoulders are pressed against ears, arms extended toward the water with the hands together, and eyes are on water looking over the tops of hands.



ILLUST. D: Hips ride above head with the legs pointing down at the water; eyes are on the water and the arms are relaxed.

Springboard Diving

PART 2

Front Takeoff Dives



THE five basic dives are a must in the repertoire of any good diver. They should be drilled and worked on so that the diver can competently perform any of them. A sound knowledge of these dives facilitates the learning and coaching of the more complicated dives.

The basic dives may be executed in either the pike or layout position. I've limited my descriptions to the layout position, with the exception of the front dive where I've included the front dive pike or "jackknife," since it's so commonly used in competition and must be considered one of the true basic dives in any repertoire.

Front Dive, Layout: As the diver leaves the board, there must be a slight forward lean. The arms, which are moving above the shoulders as he leaves, should stretch up and then be brought into position immediately as the diver is in the air (Illust. B, Fig. 1).

That position is shoulder high, straight to the sides, fingers together. The arms are held this way until the diver begins his stretch for the entry at the last possible moment. (When the arms are brought together and stretched overhead, the spin is slowed down considerably.)

As he leaves the board, the diver extends the legs sharply, *pushing forward* against the board and squeezing the buttocks together. This causes the legs to be lifted during the flight of the dive. There's a slight arch of the body, but this arch is high in the chest and never in the waist. The head is kept in the normal position, eyes looking straight ahead (Fig. 1).

This position is held until the legs are well overhead and the diver is in entry position. Then the arms are brought together overhead, the shoulders pressing against the ears, the eyes looking at the water over the tops of the hands. (Illust. C.)

The arch in the chest is eliminated as the arms come together, and the body of the diver makes a straight line from the finger tips to the point of the toes. This position is held until his hands touch the bottom of the pool. (Illust. B, Fig. 2.)

Mistake: Dive whips over, too much spin. **Causes:** (1) too much lean, (2) head and chest moving down when leaving board. **Corrections:** (1) don't, (2) lift head and chest and squeeze buttocks tightly when leaving board.

Mistake: Dive short, with pike in dive. **Causes:** (1) hips lifted as diver leaves, (2) insufficient spin developed



ILLUST. E: No. 1, drop to end of board; hurdle is slightly checked; straightened leg points to end of board, takeoff leg pressed back in line with body; eyes on end of board; arms have begun to move back to circle back and around. No. 2, take off; arms up before leaving board, chest is lifting; leaving from balls of feet which are pressing back against board; head in line, legs have straightened before board has fully lifted. No. 3, reverse position before reaching peak of lift; inverted swan, arch high in chest, abdomen flat, legs extended, head back. No. 4, line up for entry; arms together and extended to stop spin, arch of body is minimized.

when leaving board. **Corrections:** (1) squeeze buttocks tightly; if gluteals are tightly contracted, there can be no pike, (2) push harder and forward into board with feet when leaving.

Mistake: Arched and heavy entry. **Cause:** improper arch; too low in hips. **Correction:** any arch must be in chest; this kind of arch is easy to eliminate on stretch for entry.

Front Jackknife, or Front Dive Pike: The takeoff from the board is the same as in all forward spinning dives. There must be a slight forward lean. The arms which are moving up above the shoulders before the feet leave the board, continue to reach up as the diver leaves the board.

In considering this dive as a half somersault, there's very little spin needed, but whatever spin is required must be started before the feet leave the board. Just as the final push against the board is made, the hips are lifted by extending the legs and

pushing down against the board; and the head must be moving down, not up. (The faster the upper torso moves down as the diver leaves the board, the more spin he gets.)

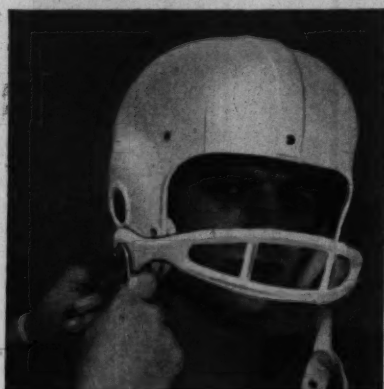
The diver sees his feet hit the end of the board, and then shifts his eyes to the water. He should never look up on a jackknife. This is done only in a swan dive or any of the flying front dives in the forward spinning group.

The hips are allowed to ride up over the head with the arms relaxed and with the feeling of the toes moving up to the hands, rather than the other way. The fingers should touch anywhere from the ankles to the tips of the toes, the pike tight, the head close to the knees, but with the eyes looking at the water. (Illust. D.) The toes are pointing directly down.

When the upper torso is in entry position, the legs are straightened out above the hips, easily, and the arms

By CHARLIE BATTERMAN, Coach, Mass. Institute of Technology

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move forward into entry position. The body is in a straight line, the shoulders against the ears and the eyes looking at the water over the tops of the hands.

Mistake: Getting "stuck"—unable to come out of pike. **Cause:** lifting head and torso too straight up when leaving board. **Correction:** start dive sooner; never look up; lower head when leaving board—watch water.

Mistake: Finishing late—no drop for entry. **Causes:** (1) holding pike position too long, (2) starting dive late. **Corrections:** (1) get into pike position before peak of lift; start opening pike as drop begins, (2) start dive sooner—on way up.

Mistake: Shoulder splash on entry. **Cause:** hands and arms not aligned with body. **Correction:** remember, after touching toes, hands must move forward to line up.

Mistake: Dive over—too much spin. **Causes:** (1) too much forward lean, (2) too much spin developed when leaving board, (3) pike position held too long, (4) reaching down when leaving board. **Correction:** (1) don't!, (2) bring head down slowly; feel that shoulders are lifting while head is lowered, (3) come out sooner to slow down spin; as drop begins open pike position and reach forward with arms, (4) arms should be reaching up when leaving board but with face down, eyes looking at water.

Mistake: Arched entry. **Cause:** Inability to feel correct entry position. **Correction:** feel as though entry is short and piked for a while until coach indicates correct entry position; overcorrect.

Reverse Dive: In this dive, as in all others, the weight must be slightly forward on leaving the board in order not to hit it.

In the reverse group of dives, however, the hurdle is "checked." This means that the forward lean is kept to a minimum and the diver depends on the forward momentum of the hurdle and the press back against the board with the feet to move him out. Any spin must occur as the diver leaves the board; you cannot get spin after you're in the air!

To get spin for a reverse dive or any dive in the reverse group, as the diver is leaving the board the chest is lifted, the head kept in line (in the natural position), the buttocks squeezed tightly together, and the legs fully extended and pressed back against the board. (Illustr. E, Fig. 3.)

The arms which are moving above the shoulders when the diver leaves, continue to reach up; and immediately after he's in the air, the head is laid gently back and the arms moved quickly into position, straight from the shoulders at shoulder level, palms rotated up slightly.

There is arch high in the chest, never in the hips, and not an excessive amount. The diver is in "swan" position before reaching the peak of the lift, and holds this position. (Fig. 3.)

When he sees the water and the legs have ridden up to a point short

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of the vertical (about 75° or between 10 and 11 o'clock), the arms are brought together overhead and the arch lessened. (Fig. 4.) By lengthening the body this way, the spin is slowed down a great deal.

As in the back dive, the spin cannot be completely stopped at the vertical. Therefore, the entry is slightly arched (Fig. 4.) and the diver hits the bottom of the pool a little in front of the point at which he entered. It's suggested that the dive be played slightly over, since, as in the back dive, it can be checked by stretching at the correct time (Refer to back dive fundamentals.)

A successful progression in teaching the reverse dive is as follows:

1. Run toward the end of the board, establishing enough forward momentum to carry you away from the board. Jump up from the end, taking off from one foot and landing feet first in the water, but at a very short angle.

2. Run toward the end of the board as above and, at the moment of leaving the board, kick one foot straight up into the air as high as possible, and at the same time, look back hard with the head *before leaving the board*.

Emphasize that the forward momentum developed in the run will carry the pupil safely away from the board. Also emphasize that the head must look back before he's in the air, and one leg should be kicked up as high as possible while the other presses back and down against the board.

This stage is practiced to give the diver the feeling of moving forward and at the same time spinning backward. When this has been accomplished satisfactorily, the next step is to do the dive with the regular approach.

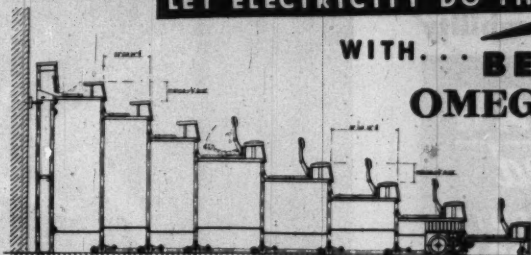
Mistake: Short; unable to get legs high enough; not enough spin. **Causes:** (1) too much lean, (2) starting dive too late, (3) trying to lift legs from board. **Corrections:** (1) "check" hurdle (refer to description of dive), (2) start dive before leaving board; head and chest must be moving up and back as feet are leaving board, (3) press down and back into board with feet, and lift chest and squeeze buttocks tightly when leaving board—this lifts legs higher.

Mistake: Too much distance; this also contributes to first error. **Cause:** aside from lean, this can be caused by "boxing" dive on takeoff, i.e., moving hips forward instead of up and in line with body. **Correction:** keep hips in line, lift chest, squeeze buttocks tightly; depend on forward momentum of hurdle to move you out, not pressing of hips forward—this will also cut lift considerably; push down against board.

Mistake: Jerky two-part execution. **Cause:** double arm and head movement; looking forward too long and then throwing head up. **Correction:** head and arms should move into position smoothly and early, before reaching peak of lift.

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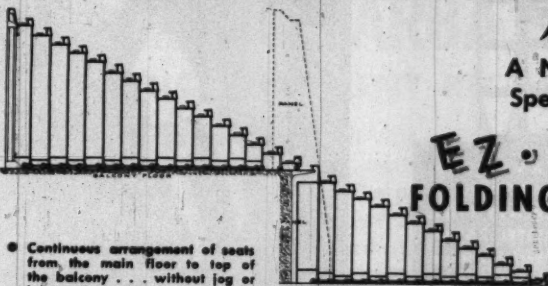


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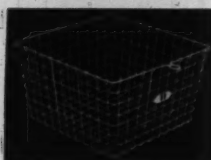
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ILLUST. F: No. 1, drop from hurdle, eyes on end of board. No. 2, take-off;
arms lifting while board is pressed (note angle), knees flexed, head up
after seeing feet hit end of board. No. 3, leading one arm, looking at water,
other arm in line, no body arch. No. 4, side swan position; body pressing
away from leading arm; eyes remain on water. No. 5, drop; eyes on water,
slight arch, arms extended to slow down spin, line up for entry beginning.

Half Twist, Layout Position: The half twist layout is a very difficult dive to learn to do well, but is a simple dive to learn to do. In competition, a grade of better than 6 for this dive is rare. It's a highly complicated dive to understand mechanically, involving angle of takeoff, the amount of twist started from the board, the direction of the press with the feet against the board when leaving, and the use of the arms when twisting.

It's further complicated by the fact that the amount of forward spin must be determined at the moment of leaving the board while, at the same time, the twist is initiated.

Essentially, the dive is a half twisting front dive, with the twist starting from the board. Attempting to do the front dive with a half twist, without leading the twist from the board, makes the dive more difficult. Also, it seems easier to do with more forward lean than in the plain front dive.

The problem is to develop enough forward spin while, at the same time, initiating enough twist to complete a half turn, but no more. The forward spin is accomplished in the same manner as in the swan dive—lifting the chest and pushing forward, and down with the feet against the board.

However, since the twist is started from the board, the press with the feet is, in addition to being down, diagonally forward into the board in the direction of the leading arm. The arms, which are above the shoulders when leaving the board, continue to reach up with one arm leading the other. (Illust. F, Fig. 3.)

As the diver moves toward the peak of the lift, the body has twisted one quarter turn, the legs have ridden up to a horizontal position, and the arms have spread to swan position.

The diver uses the arm that's forward to help him twist in the following manner. The closer one brings the weight to the axis of rotation, the faster one spins (or twists). For example, the figure skater who starts spinning with his arms outstretched spins faster and faster as he moves his arms closer to his body.

The reverse of this is also true. The farther away the weight is from the axis of rotation, the slower the spin or twist. The skater stops his spin by stretching his arms out.

Another way of expressing this is that there's a resistance to spin when the weight is far away from the axis of rotation. By having one arm forward, there's a resistance to twisting in that arm. The rest of the body can

twist away from the arm by pushing against that resistance.

I can draw an analogy of holding my right arm out against a wall, while standing with my right shoulder to the wall. By pressing with my hand against the wall, I can turn my body to the left. In the same manner, the body can twist in the air away from the arm that's forward by pushing against the resistance of that arm to turn.

This is what actually happens in the dive. The body always twists away from the leading arm. If the right arm is forward, the body will turn toward its left; and if the left arm leads, the body will turn toward its right.

The head all this time, continues to face the water, with the eyes looking at the entry point on the water over the shoulder of the leading arm. At this stage, the diver is in a sideward "swan" position. (Illust. F, Fig. 4.)

The legs continue to ride up as the body continues to spin forward, and the twist is slowed down by arching the body as it begins to drop. The arms move together for the entry (Fig. 5) and the diver, as in a back dive, moves through the water during the entry in the direction of the spin of the dive. It's very helpful to think of the finish of the half twist layout as feeling like a front dive (toward the board) rather than a back dive.

A teaching progression which has been successful is as follows:

From the edge of the pool, extend one arm toward the water and do a sideward dive, looking at the water over the shoulder of the forward arm. Then do the same thing with a spring, keeping the eyes on the water and

THIS is the second of a three-part series on springboard diving by the famous varsity swimming coach at Massachusetts Institute of Technology (Cambridge, Mass.). In his senior year at Ohio State (1944), Charlie Batterman made a grand-slam of the four national indoor springboard diving titles—winning the high board and low board championships in both NCAA and NAAU competition. From Ohio State he moved to Sampson (N.Y.) College as varsity swimming coach (1948-49), then to Harvard as assistant swimming coach and diving coach. In 1956 he took over the head coaching reins at M. I. T., where he's also varsity soccer coach and freshman lacrosse coach. His first article (last month) covered the approach and hurdle. His current piece covers front takeoff dives, and his final installment will expound the back takeoff dives.



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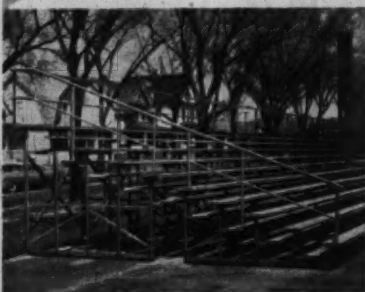
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thinking of a sideward dive, not a half twist.

Do the same, standing, from the end of the board. Then do it with the approach, thinking of a sideward swan dive, with the eyes on the water over the shoulder as you leave the board, and in normal "front dive" entry position as you enter the water.

Mistake: Short on dive; not enough forward spin. **Causes:** (1) taking dive up at too straight an angle, (2) not pushing down and forward with legs when leaving board, (3) starting twist too soon, before completing hurdle. **Corrections:** (1) get more forward lean; dive is easier to do with a little extra lean, (2) push into board when leaving, squeeze buttocks, lift chest, (3) do a normal hurdle, then move arms up and press into board as in regular front dive with variations noted—one arm leading, press diagonally forward with feet.

Mistake: Dive over, too much spin. **Causes:** (1) too much forward lean, (2) reaching down for water, moving head and chest down when leaving board, (3) starting twist late. **Corrections:** (1) don't! (2) reach up with hands, lift head and chest when leaving board, (3) lead arm off board sooner; push feet diagonally forward toward leading arm when pressing board.

Mistake: Too much twist. **Cause:** starting twist too hard, too soon. **Correction:** Think of a quarter twisting front dive for a while; reach up as in normal front dive, leading arm very little; over-exaggerate by not twisting enough for a while.

Mistake: Heavily arched entry. **Cause:** not enough forward spin. **Correction:** play dive slightly over; think of a front dive (facing board) as you enter water, not a back dive.

Mistake: Cast—legs going sideward on entry. **Cause:** developing side spin when leaving board by reaching to side. **Correction:** reach straight up and in line (forward); lead one arm forward, not laterally; think of one-half twisting front dive with emphasis on front dive rather than twist.

Defensing the Star

(Continued from page 9)

guard, for example. Hypothetically, let's assume that the latter combination is the existing threat.

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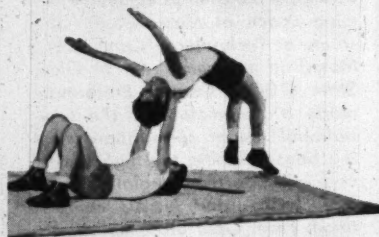
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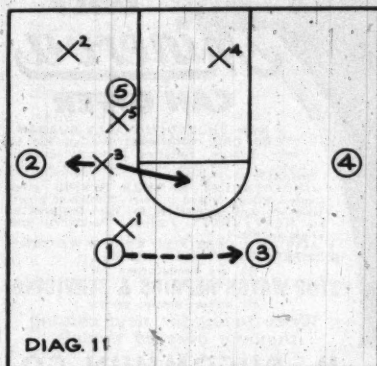
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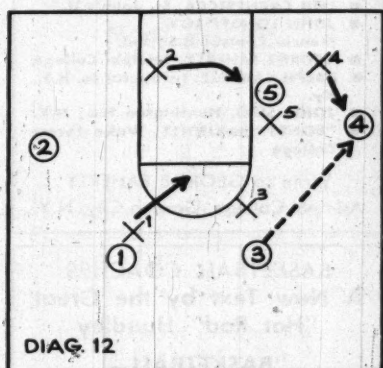
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Meanwhile, we harass the outside guard (play-maker or scorer) by pressing him all over the court. Once play reaches the opposition's front-court, we employ the 1-1-2 zone, using our two fastest players in positions x-1 and x-3, **Diag. 11**, to attack the guard, preferring to give token defensive acknowledgment to the remaining three players of the opposition.

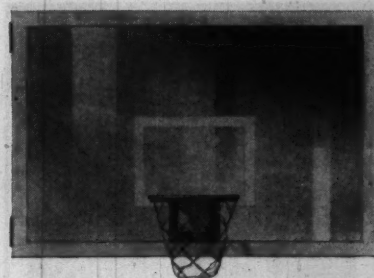
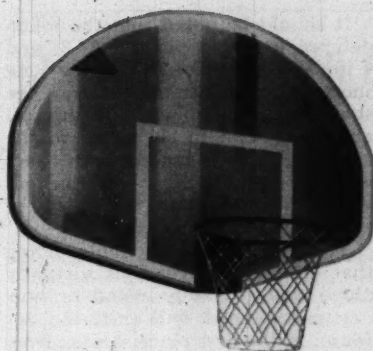


In the event one of these players receives possession of the ball (**Diag. 12**), our philosophy is to maintain a tight defense on offensive player stars 5 and 1. For example, x-3 shifts to cover any pass from 1 to 3, but x-1 and x-5 maintain a virtual tight man-for-man on players 1 and 5, respectively.



X-1 prevents the return pass, while x-5 plays directly in front of star 5, knowing that x-2 will cover any lob passes to 5 from the rear.

Once the ball is passed from 3 to 4, x-1 is permitted to sag to the free-throw line. However, he never loses sight of the fact that his responsibility is star guard 1 in event 5 should get possession of the ball or a return pass is made to 3.



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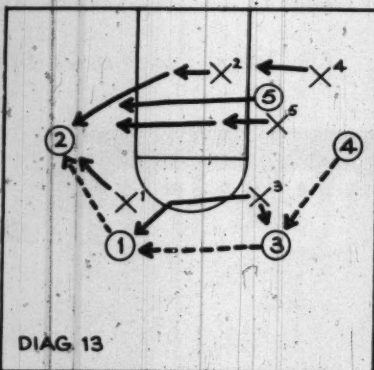
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It should be noted that the token defense given to players 2, 3, and 4 implies the following: allow long shots but force them to hurry the shot; attack the player with the ball and make him force passes to the stars; completely ignore them (barring lay-ins which we can cover) when the ball is in the hands of star players 5 and 1.

The reader has probably noted that offensive player 2 is virtually alone and probably wonders how any pass to him will shift the defense. In the first place, a pass from 4 to 2 (Diag. 12) is practically impossible. In the second place, a pass from 3 to 2 isn't likely or presents much of a real threat. And in the third place, players 1 and 5 probably will be bent upon forcing some offensive play sooner or later.

However, in the event a pass is made from 1 to 2, the same shift in responsibility as shown in the similar situation in Diag. 8 prevails. That is, x-3 assumes the man-for-man responsibility on player star 1 while x-1 moves over to give token defensive acknowledgment to 2.



DIAG. 13

Diag. 13 depicts this entire shift. Once x-2 gains position on 2, x-1 resorts back to assist x-3 with the defense of star 1.

In conclusion, the writer would like to reiterate that there's no magic formula to stop the star. The aforementioned methods have been successful for us simply because of the confidence of the players. We conduct four specific practices to develop this confidence:

First, we practice our two tandem players, x-1 and x-3, on the three-on-two defensive situation.

Second, we drill our two base-line players, x-2 and x-4, by setting up two forwards and two guards to move the ball around the outside for forward shots to make sure that our base-line defenders can move quickly enough, then we add a center to finally check defensive positions.

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AFTER a varsity career at Fresno State, John Toomasian coached several county schools, then moved into the tough Yosemite League at Roosevelt High for three years, where his teams won 55 of 71 games, including the only championship in the school's history in 1954. That team won 21 of 24 games and rostered Gary Alcorn, drafted by the Detroit Pistons this year. In Toomasian's last two years at Edison High, he's won 32 and lost just 7. All in all, his five year record in the Yosemite League reads 87 and 23. In those five years, his teams have reached the finals of five holiday tournaments and won three of them. Toomasian has just designed a fine Basketball Scorebook, which is reviewed in the New Books section in this issue.

Third, we set up five offensive players against the 1-1-2 zone only; this is hard but we set it up competitively and the results are fruitful.

And, finally, we add the fifth player, x-5, who assumes a man-for-man defense on a designated "star."

This defense isn't difficult to teach for any specific game. It can be taught within two or three days. However, with constant use throughout the year, the results are even more fruitful.

New Books

(Continued from page 47)

Coaches can supplement their coaching by distributing a copy to every member of their squad and gym class. It's a marvelous tool with which to sharpen the boys' individual tools and round out their team play.

For your personal copy, send 30¢ (covering the cost of the book plus handling) to Scholastic Book Services, 33 West 42 St., New York 36, N.Y.

A 10% discount is offered for bulk orders of 20 to 99, and a 20% discount for lots of 100 or more.

The same deal is offered for a companion book, *How to Star in Basketball*, by the same author.

- **INTERNATIONAL ATHLETICS ANNUAL, 1959.** Edited by R. L. Quercetani. Pp. 208. Illustrated. New York: SportShelf. \$1.75.

EMBODYING the feats of thousands of track and field athletes from all over the world in 1958, this unique record book classifies 100 or more performers in each recognized event.

2 new BASKETBALL FILMS FOR JUNIOR AND SENIOR HIGH SCHOOL

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2 Basketball For Boys: TEAMPLAY

Five-man offense starts with one- and two-man action and concludes with a set play based upon these actions. Defensive play progresses from the defensive triangle to full team cooperation. One-on-One: faking and quickness, shoot or drive... Two-Man Play: set screen and roll, two-man cuts, post play... Five-Man Offense: set play, continuity, team balance... Defense: defensive triangle, man-to-man, zone.



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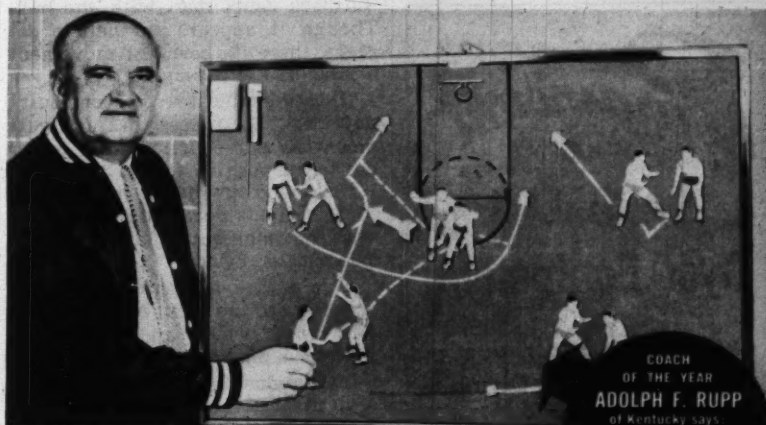
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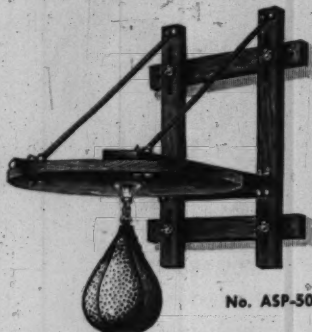
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Editor Quercetani, famous Italian statistician, includes the national records and championship summaries of dozens of countries, lists of the world's all-time best performers and the best European performances last year, and world, European and Olympic records for men and women. A handsome 16-page section rounds out the book.

• **WHAT YOU SHOULD KNOW ABOUT REBOUND-TUMBLING.** Illustrated. Cedar Rapids, Ia.: Nissen Trampoline Co. Free.

JUST out, this helpful booklet explains some fundamental facts about the activity that every teacher, coach, school administrator or parent should know.

Safety, proper instruction, effective use of space, cost, and suggestions on program planning are all covered in this new booklet. Everyone who teaches physical ed or has any responsibility for the physical ed program should obtain a copy.

Write: Nissen Trampoline Co., 215 A Avenue N. W., Cedar Rapids, Iowa.

Reverse Box

(Continued from page 7)

roaming and cutting in and out the key hole.

The cue to the particular play or maneuver is always provided by the back-court man with the ball. Though it appears to include set plays, there's a constant movement of the ball and players.

Diag. 1 delineates the continuity pattern. No. 1 passes to 2 and cuts down the side court, while 3 comes out to the position formerly held by 1. No. 2 who now has the ball, passes to 3 and cuts down the side court, with 4 coming out to take the position vacated by 2.

This is the basic pattern which is used, until the key man (person with ball) detects an opening and initiates a play.

The remaining diagrams depict several of the options that can be created from the "Reverse Box Offense."

Diag. 2 (Pick for Corner Man): No. 1 passes to 2 and cuts down side court to set up block for 3. 3 cuts to center for pass from 2. 5 moves to clear lane and turns to rebound. 1 follows for rebounding purposes, while 4 drops back for defense. (Offensive man out of play will usually drop back for defense balance.)

Diag. 3 (Pick for Guard): No. 2 fires to 4 and sets screen for 1. 1 cuts off 2's back and receives pass from 4. 5 clears area and circles to rebound. 3 is used to defense fast break, while 4 follows up shot.

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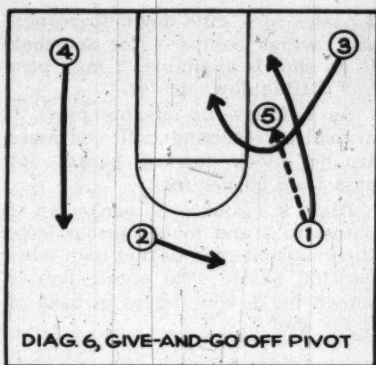
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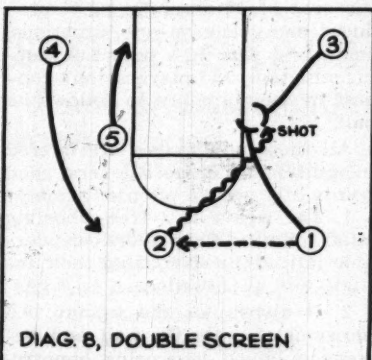
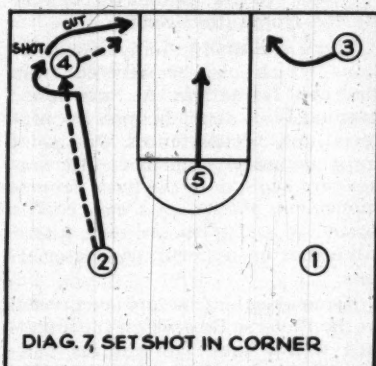


Diag. 4 (Pick by Pivot Man): No. 5 moves into position to pick for 4. Latter cuts off 5's tail for a pass from either guard. (In this example, #1 gives pass to 4, with 3, 5 and 4 in position for rebounding.

Diag. 5 (Give-and-Go Off Pivot, Pass by Forward): No. 4 passes to 5 and cuts around pivot man. 2 cuts off 4's tail, providing two potential receivers. If neither is free, 5 attempts shot.

Diag. 6 (Give-and-Go Off Pivot, Pass by Guard): No. 1 passes to 5 and follows pass, cutting by pivot man. 3 cuts off 1. As in previous diagram, there are two potential receivers with option by 5 to shoot.

Diag. 7 (Set Shot in Corner): No.

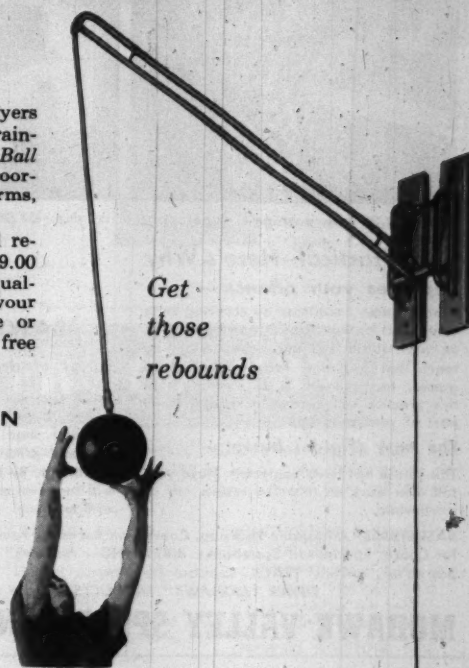


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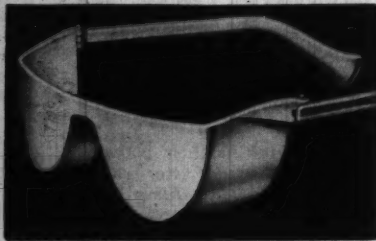
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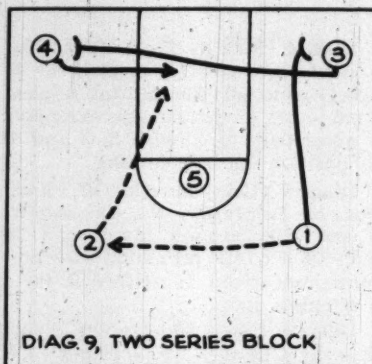
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2 passes to 4, cuts down to corner, and swings behind 4 for set shot. If no shot is available, 2 may pass to 5 cutting down center.

As a follow-up of this play, 2, instead of receiving ball, continues around block toward basket for pass from corner man.

Diag. 8 (Double Screen): No. 1 passes to 2 and moves just outside three-second area. Corner man takes position beside 1 to create double screen for 2, who drives in back of it for shot.



DIAG. 9, TWO SERIES BLOCK

Diag. 9 (Two Series Block): No. 1 speeds to corner to set up block, then 3 moves to other corner to set up block for 4. Latter cuts for basket for pass from 2. Maneuver can be started from either corner.

There are many, many more options which can be derived from the box formation. As mentioned previously, it depends upon the material and circumstances. One point must be made emphatic: All maneuvers begin with the basic reverse movement shown in Diag. 1. The sequence is carried on until a possible scoring opportunity materializes.

Some excellent factors are present in the Reverse Box which the standard weave lacks: minimizes ball-handling, devoid of unnecessary dribbling, limits confusion due to the ease of determining play, produces many one-on-one situations, every pass sets up a potential scoring situation, and players don't congest in their anxiety to follow the ball.

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10. Change of direction and pace can be utilized.

11. The one-on-one situation can be exploited frequently.

12. Conducive to a driving and aggressive style of play, which produces a great many fouls by the opposition.

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☐ Gymnasium Apparatus

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NADEN (58)

- ☐ Electric Scoreboards
☐ Baseball Catalog
☐ Basketball Catalog
☐ Football Catalog

NATIONAL SPORTS (56)

- ☐ Gym Mat Catalog
☐ Circular on Floor and Wall Mats and Covers, Baseball Bases

SEE PAGE 64 FOR OTHER LISTINGS AND FORM FOR SIGNATURE

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- ☐ Brochure on Treatment of Athletic Injuries

RICHARDS-WILCOX (39)

- ☐ Catalog on Folder-Way Folding Partitions

RIDDELL, JOHN T. (Inside Front Cover)

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ROBBINS FLOORING (57)

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WILSON (3)

- ☐ Catalog

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RALEIGH ATHLETIC EQUIP. CORP.	4th Cover
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REMINGTON ARMS COMPANY, INC.	41
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RICHARDS-WILCOX MANUFACTURING CO.	39
RIDDELL, JOHN T., INC.	2nd Cover
ROBBINS FLOORING COMPANY	57
RONALD PRESS COMPANY	52
SAFWAY STEEL PRODUCTS, INC.	49
SAND KNITTING MILLS CORPORATION	53
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SPANJIAN SPORTSWEAR	43
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WELLS, J. W., LUMBER COMPANY	55
WESTERN CINE SERVICE, INC.	62
WIGWAM MILLS, INC.	46
WILSON SPORTING GOODS COMPANY	3

NAME _____ POSITION _____
(Principal, coach, athletic director, physical director)

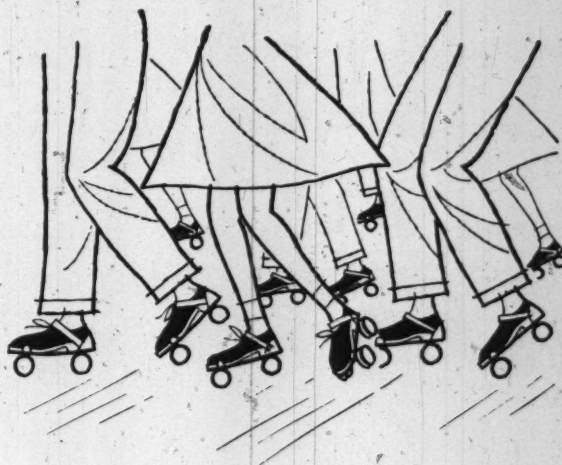
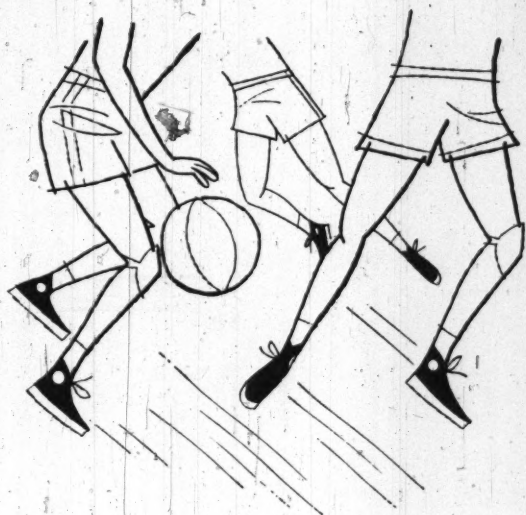
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ADDRESS _____

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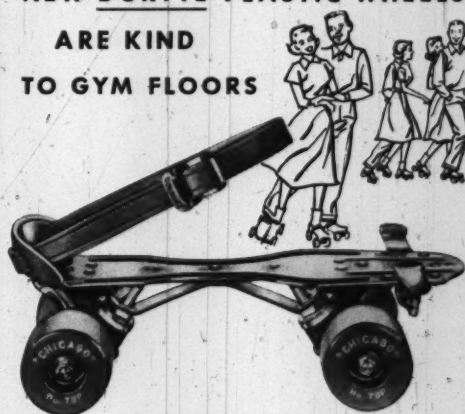
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